

GRAIN & FEED JOURNALS

CONSOLIDATED

A Merger of Grain Dealers Journal, American Elevator & Grain Trade, Grain World and Price Current-Grain Reporter

Vol. LXXIV. No. 6.

Chicago, Ill., U. S. A., March 27, 1935. Price \$2.00 Per Year. 25 Cents Per Copy.

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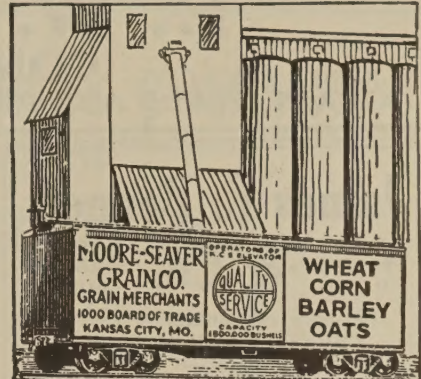
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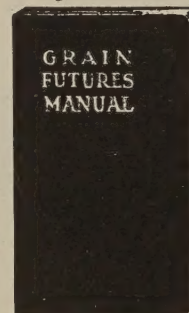
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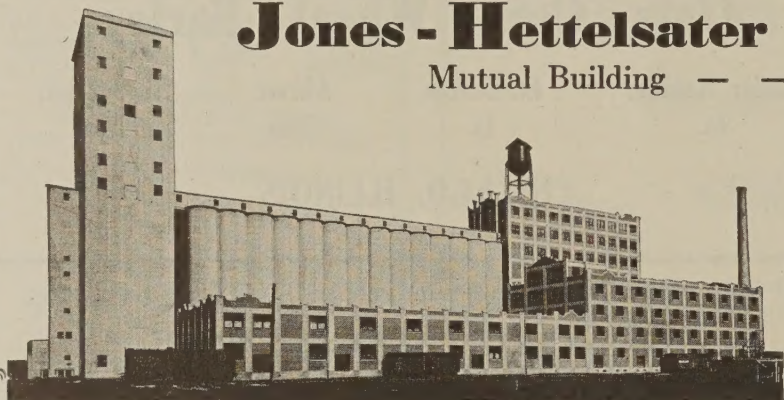
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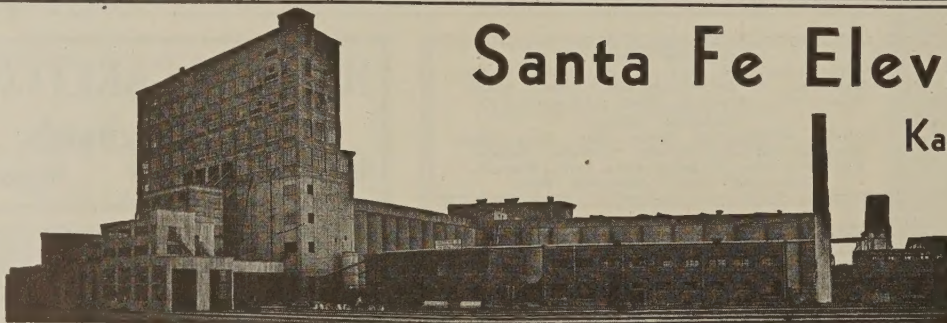
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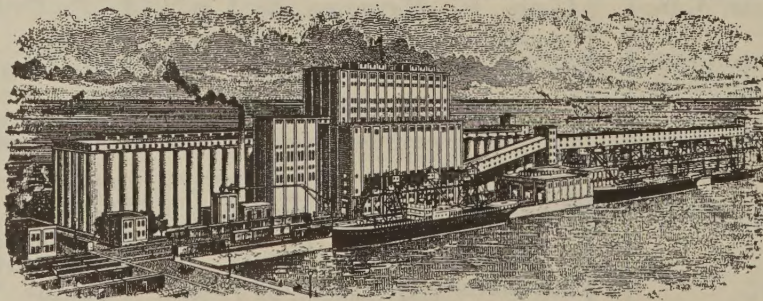
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IOWA—Good feed mill for sale; well equipped in good condition; also residence, modern, good location, good business, only mill in good county seat town of 3500. Write 74D3 Grain & Feed Journals, Chicago, Ill.

ONE OF THE BEST mills money can build for sale, good business, no close competition; one-half cash, balance easy terms. Write 74F10 Grain & Feed Journals, Chicago, Ill.

NO NEED FOR FORMALITIES—You don't need an introduction to Journal Want-Ads. They will help you without, whatever your problems may be.

FLOUR MILL WANTED

2,500 TO 3,000-BBL. FLOUR Mill wanted; must be modern. Send full details and price, with and without real estate. Address 74C2, Grain & Feed Journals, Chicago, Ill.

AN ILLINOIS elevator company running a 3 line ad in one issue says: "We had 25 applications from that ad. Thank you."

BUSINESS OPPORTUNITIES

INDIANA—Good coal & feed business; very good location for elevator site for sale; elevator burned last fall, coal shed remains, this for sale too; located on C. & O. R. R.; C. I. & L.; C. & E. I.; Pere Marquette or Penn.; good rate to Mich. points; very good grain section; other interests reason for selling. 74D5 Grain & Feed Journals, Chicago. Bargain at price offered.

WHATEVER your business may be, it will find a ready market if advertised in the "Business Opportunities" columns of GRAIN & FEED JOURNALS, Chicago. 9,800 grain men look to these columns twice each month for real opportunities.

ELEVATORS WANTED

IF YOU DO NOT find the elevator you want advertised, place your wants in the "Elevators Wanted" section and you will receive full particulars regarding many desirable properties not yet advertised.

SEEDS FOR SALE

NOW IS THE TIME to get your farmers started right by planting oats that make both dealer and farmer money. Samples and prices on request. Metamora Elvtr Co., Metamora, O.

SITUATION WANTED

WANT POSITION as grain buyer or manager of elevator; 20 yrs. exper. handling grain; ref. 74F2 Grain & Feed Journals, Chicago, Ill.

FEED SALESMAN desires position in Ohio; eight years continuous contacts with dealers. Write 74E5 Grain & Feed Journals, Chicago, Ill.

EXPERIENCED GRAIN man desires position, expert mechanic can handle any kind of power and furnish best of references. Chas. C. Ingalls, Otterbein, Ind.

POSITION WANTED as manager of country elevator or assistant with terminal elevator. Thoroughly experienced; can furnish best of references. Fred Hunter, 355 Willow St., Lombard, Ill.

WANT POSITION as elevator manager, office manager or bookkeeper; last two yrs. successful elevator manager reports produced if necessary; 10 yrs. clerk, account, office manager in feed and seed house and dairy; 3 yrs. working partner on large Iowa farm; age 32; good education. Write 74E6, Grain & Feed Journals, Chicago.

Bargain Sale in Soiled and Shelf Worn

Books

Improved Railroad Claim Blanks require little of your time for filing, and contain spaces for all the necessary information in the order which assures prompt attention on the part of the claim agent. They increase and hasten your returns by helping you to prove your claims and by helping the claim agent to justify payment. Are printed on bond paper, bound in books, each containing 100 originals and 100 duplicates, with two-page index, instructions and summary, with four sheets of carbon. The original is sent to the claim agent, and carbon copy remains in the book, as a record of your claim. Sells for \$2. Have few loosely bound and soiled, one at \$1, four at \$1.25 and two at \$1.50. Order 411-E (overcharge in freight or weight) "Special."

All prices are f. o. b. Chicago.

GRAIN & FEED JOURNALS Consolidated
332 South La Salle St. Chicago, Ill.

KEEP POSTED

GRAIN & FEED JOURNALS
CONSOLIDATED
332 So. La Salle St., Chicago

A consolidation of Grain Dealers Journal, American Elevator & Grain Trade, Grain World and Price Current-Grain Reporter.

Gentlemen:—In order to keep us posted regarding what is going on in the grain and feed trades outside our office, please send us the *Grain & Feed Journals* twice each month. Enclosed find Two Dollars for one year.

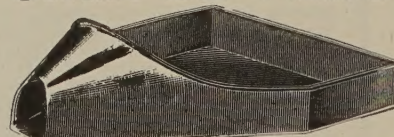
Name of Firm.....

Capacity of Elevator.....

Post Office.....

State.....

SAMPLE PANS



Made of sheet aluminum, formed by bending, reinforced around top edge with copper wire. Strong, light, durable. The dull, non-reflecting surface of the metal will not rust or tarnish; assists users to judge of the color and to detect impurities.

Grain Size, 2½ x 12 x 16½", \$2.00 at Chicago.
Seed Size, 1½ x 9 x 11", \$1.65 at Chicago.

GRAIN & FEED JOURNALS
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332 So. La Salle St., Chicago, Ill.

MACHINES FOR SALE

CLIPPER CLEANERS for sale, 29-A and 29-D. W. R. Roach & Co., Grand Rapids, Mich.

FEED MIXER— $\frac{1}{2}$ -ton cap.; vertical; used little. 74D11 Grain & Feed Journals, Chicago.

CORN CRACKER & Grader; cutter; grader; aspirator. 74D13 Grain & Feed Journals, Chicago.

ALMOST ANYTHING YOU WANT can be promptly obtained through **JOURNAL** want ads.

HAMMER MILL—20 to 40-h.p.; A-1 mechanically. 74D10 Grain & Feed Journals, Chicago.

CORN CRUSHER & Feeder; good as new; used on hammer mill. 74D14 Grain & Feed Jnl's.

ONE BAUER HAMMER mill for sale, direct driven, 60-h.p., Fairbanks ball bearing motor, good as new. Write Bader & Co., Vermont, Ill.

WRITE ME

I have some splendid bargains in Feed Mill machinery. L. R. Veatch, 428 Pratt Street, Buffalo, N. Y.

FOR QUICK SALE B&L 3 pr. high 9x18 stand; 1 N&M 2 pr high 9x24 stand; 10 cast iron boots with pulleys; Draver feeders (used); 1 N&M meal drier. Puritan Mfg. Co., Omaha, Neb.

FEED MIXERS—Hand or power, 100 to 2,000-lb. cap.; "Giant Whirlwind" famous for speed, economy and perfection of blend. Write for catalog. Brower Mfg. Co., Dept. X-15, Quincy, Ill.

SELL YOUR SECOND HAND Machines Now—tomorrow they will not be worth as much as they are today. A shiny machine which has just been in operation sells quicker and brings a bigger price than a dirty, rusty one.

BOSS AIR BLAST CAR LOADER

Rebuilt at the factory and carrying the same guarantee as a new machine. **BARGAIN.**

Pneumatic Grain Machinery Corp., 322 S. Patterson Blvd., Dayton, Ohio.

REAL BARGAIN—Jay Bee hammer mill equipped with 50-hp. electric motor for sale; Homer Automatic separator; Puritan dust collector. All in A-1 running condition; will accept part cash and terms or note for balance. Write 74C4, Grain & Feed Journals, Chicago, Ill.

WANT ADS WORK WONDERS

They sell elevators, find help and partners, secure machines and engines which you want, sell those for which you have no further use, and perform a myriad of kindred services for shrewd people who use them regularly. **READ and USE THEM.**

GOOD USED MILL Equipment, Cheap. One 9x18 three pair high Nordyke & Marmon Corn Roll; one Monarch Knife Machine Corn Cutter with Magnet; Rolls, Reels, Sifters, Purifiers, Bran and Flour Packers, Dust Collectors, Scourers, Receiving Separators, Corn Shellers, Attrition Mills and Hammer Mills, Elevators, Shafting, Bearings, Friction Clutches and Good Used Leather Belting. Write 74F11 Grain & Feed Journals, Chicago, Ill.

NEW AND REBUILT MACHINERY

1-1000 lb. vertical feed mixer connected to geared in the head motor; 1-1500 lb. horizontal mixer, 1 Vita cereal mill; 1 Rosco oat huller; 1 cold molasses mixer; 1 corn cracker and polisher; 1 Eureka corn cutter and grader; 1 corn cutter, grader and sacker combined; 1-4 bu. Richardson receiving scale; Union Iron Works sheller; water wheels; No. 3 Monitor cleaner; 1-No. 6 Invincible tri-screen receiving separator; Clark power shovel; pulleys all sizes; No. 9 clipper cleaner; Jay Bee and Gruendler hammer mills; Monarch attrition mills; 50-h.p. full diesel engine; car loader; 2 pr. high feed rolls 9x18; 1 Carter disc No. 2527; 1-300-h.p. Westinghouse synchronous motor; one 89 Clipper and one No. 6 Monitor Grain Cleaner. Everything for the feed mill and elevator. Write your wants. A. D. Hughes Co., Wayland, Mich.

MACHINES FOR SALE

FEED MIXER, 1 ton cap. with motor, used only short time. 74F12 Grain & Feed J., Chicago.

HAMMER MILL; Gruendler No. 3, connected 50-hp. F-M motor. Hebron Feed Co., Hebron, Ind.

ONE NO. 18-23 CARTER Disc Separator for sale in good condition. Box 104, Kans. City, Mo.

BAR NUN HAMMER Mill for sale, 60-h.p. rebuilt, first class condition. Write 74F3, Grain & Feed Journals, Chicago, Ill.

NO. 16 PAPEC MILL with feed collector for sale, used only 6 wks., like new; \$235. Jacobson Machine Works, Inc., Minneapolis, Minn.

WHY BUY HIGH PRICED Electric Current when you can buy like new, one 56-h.p. Continental Stationary Power Unit. Used less than 6 mos. Part cash and terms on the balance. Write 74F9 Grain & Feed Journals, Chicago, Ill.

MACHINES WANTED

OIL COMPENSATOR wanted for starting 40-h.p. Century motor. Write Dewey Lorenzen, Clutier, Iowa.

MOTORS FOR SALE

WAUKESHA FOUR Cylinder Motor for sale; in good condition; a bargain if taken at once. Wolfe Grain Co., Shipshewana, Indiana.

ENGINES FOR SALE

BOLINDERS DIESEL engines for sale; 20 sizes; from 6-h.p. to 400-h.p. Have a few used engines with factory guarantee. Bolinders Co., 33 Rector St., New York, N. Y.

ANY KIND, ANY SIZE, Any Price engine, which is not in use, and which you wish to sell, will find many ready buyers if advertised in the "Engines For Sale" column of **GRAIN & FEED JOURNALS.** Try it.

SAMPLE ENVELOPES

SAMPLE ENVELOPES—SPEAR SAFETY—for mailing samples of grain, feed and seed. Made of heavy kraft paper, strong and durable; size $4\frac{1}{2}$ x7 inches. Have limited supply to sell at \$2.35 per hundred or 500, \$10.00 plus postage. Sample mailed on request. Grain & Feed Journals, 332 S. La Salle St., Chicago, Ill.

Improved Duplicating Grain Tickets

Use of Form 19GT as a scale book saves much time and labor as one writing with the use of carbon gives a complete record and at the same time, a ticket for the hauler.

Each of the 125 original leaves bears four scale tickets, is machine perforated, printed on white bond, size of tickets $3\times6\frac{1}{4}$ inches. The 125 duplicates are printed on manila, but not perforated. Check bound at top of tickets with hinge top cover, 500 tickets in each book arranged horizontally. Each book $7\frac{1}{4}\times12$ inches. 250 leaves with 5 sheets of carbon.

Each ticket has spaces for following record: "Owner, Hauler, Grain, Grade and Dockage, Gross, Tare, Net, Total Dockage, Net Pounds, Bushels, Price and Amount, Storage Ticket No., Station Ticket No., and Date, Weigher, Name of Firm or Buyer." Order Form 19GT Duplicating. Price \$1.20 plus postage.

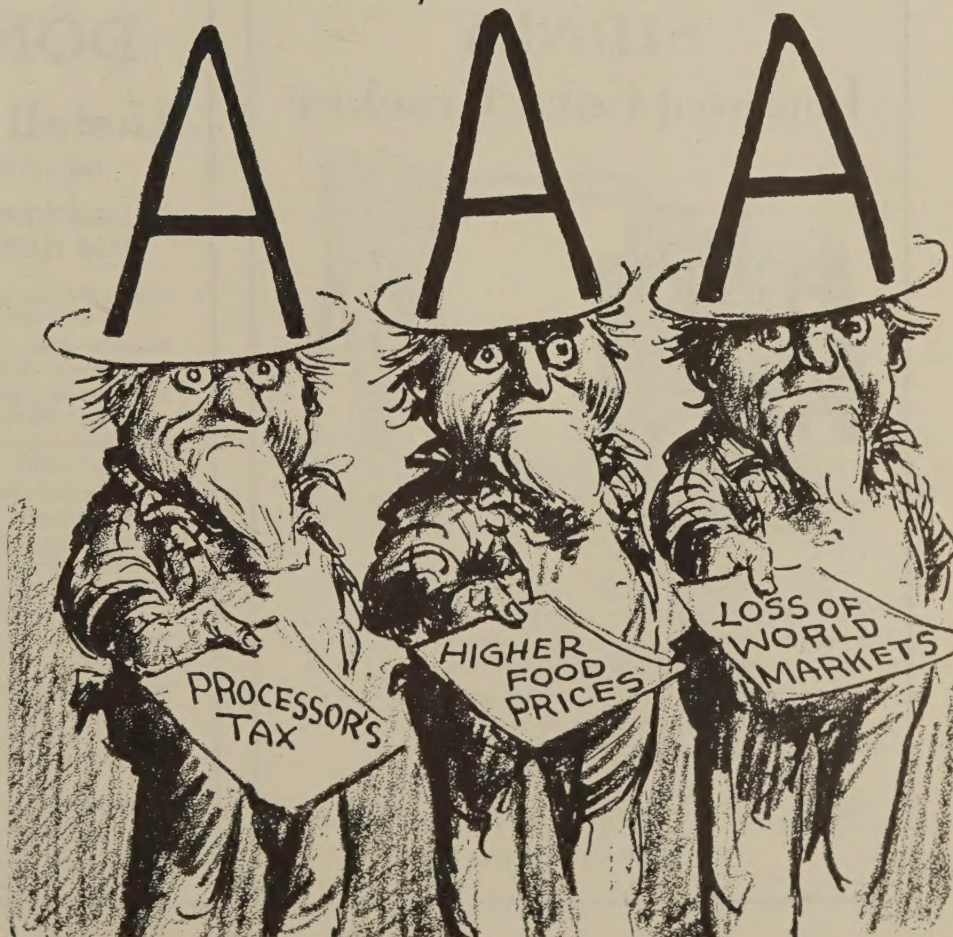
Triplicating is the same form as 19GT described above with 125 sheets strong white tissue for buyer, bound in between the original tickets for hauler and the duplicate for headquarters so as to make three copies with one writing. Five sheets dual faced carbon, 375 leaves, weight 3 lbs. Order 19GT Trip. Price \$1.65 plus postage.

GRAIN & FEED JOURNALS

Consolidated

332 So. La Salle St.

Chicago, Ill.

The 3A Boys Collect a Few Bills

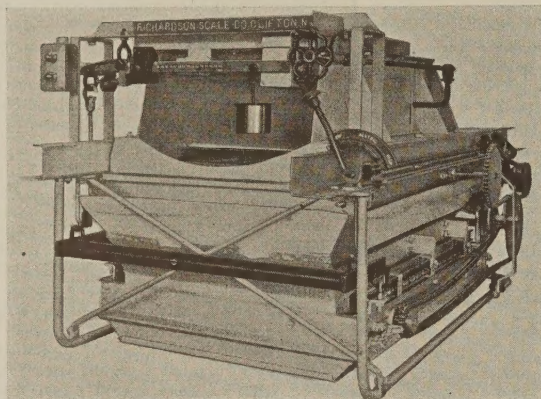
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A combination of Feeder and Automatic Scale
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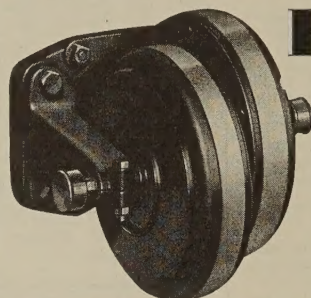
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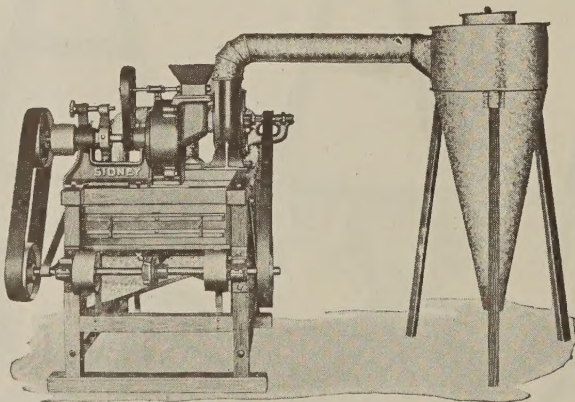
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The advantages of the Buhler Drive
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SIDNEY Improved Corn Cracker



Every custom grinder and mixer of feed can
materially increase his business if his plant is
equipped with an efficient corn cracker and grad-
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Before the Spring Electrical Storms

**LIGHTNING PROTECTION SOON PAYS
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Pennsylvania Millers Mutual Fire Insurance Company
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Harrisburg, Pennsylvania

Millers Mutual Fire Insurance Company of Texas
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**ASSOCIATION OF MILL AND ELEVATOR
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230 East Ohio Street

Chicago, Illinois

GRAIN & FEED JOURNALS

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332 S. La Salle St., Chicago, Ill., U.S.A.

Charles S. Clark, Manager

A merger of
GRAIN DEALERS JOURNAL
Established 1898

AMERICAN ELEVATOR & GRAIN TRADE
Established 1882

THE GRAIN WORLD
Established 1928

PRICE CURRENT-GRAIN REPORTER
Established 1844

Published on the second and fourth Wednesdays of each month in the interests of better business methods for progressive wholesale dealers in grain, feed and field seeds. It is the champion of improved mechanical equipment for facilitating and expediting the handling, grinding and improvement of grain, feeds and seeds.

SUBSCRIPTION RATES to United States and countries within the 8th Postal Zone, semi-monthly, one year, cash with order, \$2.00; single copy current issue, 25c.

To Canada and Foreign Countries, prepaid, one year, \$3.00.

THE ADVERTISING value of the Grain & Feed Journals Consolidated as a medium for reaching progressive grain, feed and field seed dealers and elevator operators is unquestioned. The character and number of firms advertising in each number tell of its worth.

Advertisements of meritorious grain elevator and feed grinding machinery and of responsible firms who seek to serve grain, feed and field seed dealers are solicited. We will not knowingly permit our pages to be used by irresponsible firms for advertising a fake or a swindle.

LETTERS on subjects of interest to those engaged in the grain, feed and field seed trades, news items, reports on crops, grain movements, new grain firms, new grain elevators, contemplated improvements, grain receipts, shipments, and cars leaking grain in transit, are always welcome. Let us hear from you.

QUERIES for grain trade information not found in the Journal are invited. The service is free.

CHICAGO, ILL., MARCH 27, 1935.

A CLEAN elevator has no attractions for weevil, moths or other grain infesting insects.

CODE ASSESSMENTS on side lines are not gaining popularity with country elevator operators.

SO MANY STATES are appropriating money to lend farmers for the purchase of field seeds, it should not be difficult for all to plant their full allotted acreage of all grains.

SO MANY country elevators are being overhauled, remodeled and rebuilt, it is evident elevator owners fully appreciate that they are paying dearly for the continued operation of wornout obsolete plants.

NEW GRAIN elevators reported in this number show conclusively that country grain dealers expect to have plenty of grain to handle in spite of dust storms, chinch bugs, drouth and the AAA.

THE MILLIONS of citizens east of the Mississippi who have spent much time recently sweeping red soil off of their porch steps do not waste any time asking, "What is the matter with Kansas?" They know.

IT SEEMS unfair to regular dealers handling hay year in and year out to require permits for the shipment of hay at reduced rates when farmers buying thru the N. E. R. A. feed bureau agencies need furnish no drouth certificate.

AN UNGUARDED pulley is charged with taking the life of a Pennsylvania feed mill operator in this number. If more time and thought were given to safeguarding all moving machinery, fewer lives and limbs would be sacrificed.

RULES AND REGULATIONS for the enforcement of the state sales taxes, which the tax eaters justify by the so-called "emergency," is keeping dealers in farm supplies guessing as to what is and what is not exempt. It pays to keep posted.

GRAIN DEALERS who refused to pay any code assessment on their side lines are still using the money in their business. When the NIRA stops changing its orders or rulings on who must pay on side lines, country merchants can form some definite idea of what is expected of them.

DURING THE FIRST 50 years of country elevator service all buildings used in connection therewith were painted red, principally because the railway companies set the example. But now, elevator men everywhere seem most favorably disposed toward the use of aluminum paint, and the battleship gray is surely easier on the eye.

ONE OF the encouraging developments in connection with the AAA's acreage reduction contracts is the installation of better cleaning facilities by country elevator operators and the addition of another side line—fertilizer. Naturally grain buyers and farmers are vigorously opposed to any reduction in either the volume or quality of grain produced.

ONE OF the most encouraging signs for better business for country elevator operators is found in the fact that more grain dealers are preparing to clean, treat and test seed grain this season than ever before. Their direct interest in a greater volume and better quality of grain for their patrons harvest insures a conscientious effort to help their customers to obtain dependable seeds.

OPEN TRADES in wheat futures correctly reflect the public interest or lack of it in the speculative grain market. The shrinkage to a four year low this week at a time when drouth threatens and visible stocks diminish is contrary to past history, and must be ascribed to the increased fear of what Washington may do to upset the plans of investors in grain after the enactment of the commodity exchange bill.

JACK FROST seldom comes out of the ground in the spring that he does not disrupt the foundation of your outside scales. Of course, if all your scales are weighing against you, it behooves you to employ a competent inspector with a truck load of test weights to determine the trouble and reseal your scales immediately. A small variation in your own scales might cost you every day many times the usual charge for inspection. It is far better to know that your scales are giving accurate weights, for it takes many seasons to live down a reputation for short weights.

SMUGGLERS continue to haul wheat across the Canadian borders in order that they, too, may share in the profits offered wheat growers by the present high prices in U. S. A. The heavy fines and punishment provided for such offense does not seem to deter the avaricious smugglers.

WIND not only blew a lot of wheat out of the ground in the Southwest last week, but it damaged a number of country grain elevators and offices throughout the grain belt. Most of the sufferers were protected by windstorm insurance. An empty elevator offers so much resistance to the usual windstorm it really challenges the wind to do its worst.

THE STATISTICIAN who can make head or tail out of the last report of the government on probable acreage of crops to be harvested has not yet come to the front. None deems himself qualified to guess what allowance the department made for probable abandonment. When experts are thus befuddled what about the farmer for whose guidance the department pretends to put out the alleged information?

THE B. & O. R. R. attempted to pile sixteen freight cars on top of the Farmers Elevator at Trenton, O., recently and spread much of the wreckage over the tracks of the C. & L. E. R. R. While some leases for elevator sites on railroad right of way make the elevator owner liable for all damages resulting, the offending railroad generally helps to repair the house, because it has a selfish interest in the continuation of every business which produces freight tonnage.

THE MINNESOTA WAREHOUSE & Railroad Commission has adopted a charge of 50 cents for weighing and 50 cents for inspection of truck-loads of grain taken from one terminal elevator to another in the terminal markets of that state. In view of the fact that the Commission only supplies the men to do the weighing, the facilities being provided by others, it would seem that country elevator men weighing for transient truckers are entitled to a weighing fee of \$1 a load.

SHARPER with fraudulent checks to cash or to be given for small purchases are interested principally in the change they seek to collect from unsuspecting merchants. A stranger who had just bought a farm near Richmond, Mich., collected change from a number of local merchants one Saturday afternoon recently after the banks were closed. Four intended victims escaped. The grain merchant preferred to deliver his feed C. O. D. and the others objected to stripping their cash drawer, so they were saved from loss.

A DOUBLE receiving sink under each dump generally doubles actual elevating capacity of the leg served because it provides work for the leg continuously even tho two kinds or two grades of grain are moving to market at the same time. The double sink not only helps to relieve the congestion when the heavy movement is on, but it warrants the installation of a longer leg and if the sinks are of generous proportions the elevator operator will not be forced to wait until the farmers have gone to bed for a chance to load a car.

THE COST of applying cheap paint to an elevator is the same as applying the best materials obtainable, so the most durable paint is always the least expensive in the long run. However, much depends on the proper mixture and application of the paint if satisfactory results are to be attained.

MISSOURI IS threatening public elevator men with a new tax of 2% on grain storage and warehousing fees. Naturally the grain handlers of the state are protesting most vigorously. There seems to be no good excuse for singling out the grain industry with a tax on fees which have always been low.

RESPONDING TO THE demands of railway labor unions, the state legislature of California, Colorado and Nevada have recently passed bills limiting the length of both passenger and freight trains, thus increasing the expense of railway operation and the cost of transporting freight. If the railroads are to submit to this new regulation, then it would be even more difficult for them to compete with trucks and more of the unprofitable lines will be torn up. Increasing the cost of operation of any business at a time like the present is threatening the life of the industry affected and increasing the handicaps to every industry served by the transporting agency.

How AAA Opened the U. S. Markets to Foreign Exporters

Continued imports of grain, livestock and other farm products in large volume proves how very helpful the AAA is to the farmers of other nations. If the farmers of the U. S. A. had not been induced to reduce their acreage or to plow up grain in excess of the acreage allotted them, they would have produced enough to supply the home needs. Notwithstanding this impressive lesson our stubborn champions of farm regimentation persist in striving to induce U. S. farmers again to reduce production below 1932 and 1933 crops. Doubtless the U. S. A. will import over eighty million bushels of foreign grain during the current crop year in spite of the import duties which are supposed to be prohibitive. The grain imported was sold at less than the price obtainable for domestic grain, otherwise it would not have found buyers here. Now that the feeding demand has fallen below expectations, the holders of surplus domestic grain are experiencing difficulty in finding buyers for their stocks at the prevailing market. All seaboard markets seem to be surfeited with stocks of foreign grain, so this supply must be exhausted before grain remaining in country elevators can find buyers in the seacoast markets.

Governmental interference with the production or marketing of grain has proved a dismal failure in every country where it has been attempted, yet our meddling bureaucrats are unwilling to profit by the experience of other nations and blunder through one expensive experiment after another with real benefit to none except the tax eaters. How long will the sufferers submit to such destructive interference? The grain producers of Canada, Poland, Roumania and Argentina have the AAA to thank for many unexpected tho profitable sales.

N.R.A. on Way Out

Grain merchants in town and country have been so well organized for many years past that they had little to gain thru the formulation of codes of fair competition. To the extent that it could be done without violating the anti-trust act the National, the State, and the Exchange organizations had already enforced fair dealing, and the rank and file will shed no tears over the approaching demise of the N.R.A.

A score of court decisions have trimmed down the wings of the N.R.A. until the bird can scarcely flutter. Yesterday, it is reported, the government decided to drop the Belcher lumber case, to side-step a ruling by the Supreme Court of the United States adverse to control of industry by the central government.

Yesterday a federal judge in Oklahoma advised business men engaged in intrastate commerce to refuse to answer N.R.A. questions about their business.

After two years' experience it seems that the White House feels that the N.R.A. has not built up a sufficient record of achievement to warrant its defense. Can the backers of the A.A.A. point out that benefits of crop control have exceeded their cost to all of us?

Time for an Organized Move

So many country elevators have been robbed by thieves and yegg men during the last few years, it seems time some organized effort was being made by the sufferers to place a permanent check on the activities of these midnight visitors. This number contains a number of news items regarding the stealing of timothy, clover and alfalfa seed, as well as the blowing open of safes. It seems as tho we publish at least 25 notices of such depredations without one being punished therefor, so it is quite encouraging to have one item from Iowa in this number telling of a thief of clover seed being sentenced to five years in prison for his offense.

It should not be difficult for elevator men suffering the loss of seeds immediately to drop a postal card to all dealers within a radius of 100 miles advising them of the loss so that they will be on their guard when the thieves offer them stolen seed for sale.

Giving all seed bags a distinctive mark would at least help to place regular established buyers on guard. The capture of a few seed thieves and their punishment would help to discourage others from indulging in the too common pastime of preying upon seed handlers.

The safe-breakers, who as a rule are after money, are more difficult to capture. But more secure locking of grain elevator offices would help to prevent their frequent entrance.

Amending the AAA

The proposed amendments to the Agricultural Adjustment Act have not grown out of any demand by the producers that the Act should be strengthened in order to confer still greater benefits on agriculture. So well satisfied are the milk producers of the Chicago area that the A.A.A. is of no benefit to them, they have voted to get out from under the A.A.A. and make their own agreements with the milk distributors without interference by the bureaucracy. The cattle men do not ask for the doubtful benefits of a processing tax. Prices of farm products already have advanced to the desired parity in many instances. The corn-hog program for 1935 has received one-half as many signers as the 1934 program.

Altho the Farm Bureau Federation and the Grange, assuming to represent the farmers, favor the amendments, it is safe to say, if the farmers knew what the proposals would do to them a majority would prefer freedom from control.

When the growers, who are to be the alleged beneficiaries, show decreasing interest in the economic experiments of the bureaucracy, the demand for severe control must emanate from the officeholders themselves seeking to bolster up a policy of scarcity, now beginning to be seen as an economic blunder.

At a time when the heads of the N.R.A. are telling Congress that hundreds of codes should be scrapped the heads of the A.A.A. are demanding that control of marketing be made more stringent. The difference is that the march of events has been more rapid in the industrial field in which N.R.A. operates. Industrial control by government has proved itself to be a failure in less than two years' time. In manufacturing the turnover from raw material to finished product may be effected twenty times in one year, affording ample experience. In agriculture the turnover is but once a year, and the failure of the scheme to operate successfully is not at once apparent.

Testimony of merchants and manufacturers and processors in every line who have appeared in opposition to the amendments probably has convinced the congressmen that the processors sought to be licensed do not want greater control. What the congressmen should be made to understand is that the whole scheme of control by government is headed for certain failure. Government control of farming will be wrecked on the two rocks of consumer resistance to high prices of food and unwillingness of producers to cut down their crops when prices are rising. How can an urban congressman expect to be re-elected to office on the platform that he has been responsible for raising the cost of food, that he placed the excessive tax on the consum-

It is easy to find reasons why other people should be patient.

George Eliot.

er's pork chop? How can the farmer be expected to vote for the member of congress who fixed it so that when markets were good and prices high he had nothing to sell?

Furthermore, all this governmental tampering with farming and industry is unnecessary to bring about recovery, which is due to arrive when capital turns to investment in the durable goods industries and in construction, and not until then. Thus far government action has served to hamper rather than to bring about recovery. The Frazier-Lemke law discourages loans to improve farm property by the erection of buildings; and the threat of depreciation of the dollar discourages investors who fear their loans for construction will be paid off in depreciated paper. Investors who have suffered the loss of 40.94 per cent of their investment by act of Congress and the executive have sufficient warning to retire from the loan field. When investors generally become convinced that to protect their capital they must buy outright farms, equities and common stocks, employment and prosperity will return. All attempts to create a planned society can but delay business revival.

As a movement in the direction of a planned economy managed from Washington the proposed amendments to the A.A.A. for the licensing of grain dealers and flour millers must be condemned as uncalled for, wasteful and destructive.

Excessive Inspection Fees Unfair

So long as the states conducting the inspecting and weighing of grain limited their fees to the actual cost of rendering the service, the grain producers and handlers paid the fees without protest. But the minute the politicians began to overload the payrolls of the inspection offices with supernumeraries the sufferers began to object.

The weighing and grading of grain offered for sale in public markets is a service best performed by disinterested parties. Hence producers and handlers have always been willing that this service should be rendered by a State Department, altho the rendering of such service is entirely outside the province of government.

The Kansas Inspection Department for years was one of the worst offenders and frequently transferred large sums from its grain inspection fees to the general funds of the state. And now the Oregon State Legislature is considering a bill openly providing for the transfer of a portion of the fees collected from the grading of grain to the general fund of the state. In other words, grain shipped into the state from outside points must contribute to the support of the state government. Inasmuch as state government is directly interested in encouraging the marketing of grain in its central markets where public inspection is obtainable, we would naturally expect the state to do everything in its power to attract a larger volume of business to those centers.

The producers and handlers as a rule are more than willing to pay a reasonable charge for good service, but when it comes to paying an excessive fee in order to contribute liberally to the maintenance of the state government, all interested will vigorously protest.

License Fee for Grain Handlers

The radical legislators of several states are now seriously considering the enactment of laws providing for the licensing of all persons dealing in agricultural products and for the inspection of their records. This is also provided for by the amendments proposed for the Agricultural Adjustment Act.

Inasmuch as all grain handlers are subject to the same laws as other citizens, and have not been charged or found guilty of any unusual crimes against the state or their customers, there seems no justification for any new regulation of this class of merchants other than an excuse to provide a lot of easy berths for another army of lazy bureaucrats.

There is one peculiar phase of this law making business that is difficult to understand, but it seems common to all members of the political profession. As soon as they are elected to office and get sufficient time satisfactorily to adjust their new halo, they start in to reform and regulate humanity in all of its various activities, regardless of whether there is any call for supervision or regulation from any quarter.

Why the merchants engaged in any line of business should tolerate this uncalled for interference with their business, is past understanding. There is not half the need for regulating the merchants engaged in handling agricultural products as there is for regulating the vast number of political appointees who perform no useful service, yet feed regularly at the public crib.

Salient Changes in Grain Futures Act

As reported out by the House Com'te on Agriculture Mar. 18 the commodity exchange act adds rice, mill feeds, butter and eggs, to the list of grains, flaxseed and grain sorghums regulated.

The Commission is authorized to limit trading as to both volume and price fluctuation.

Each customer's funds entrusted to a commission merchant must be used only to margin the trades of that customer.

Floor brokers and commission merchants must register (be licensed).

Regular warehousemen must keep such records and make such reports as the Sec'y of Agriculture may desire.

After the expiration of a delivery month the Sec'y may at his pleasure give shorts 3 to 10 additional business days to make delivery.

No board of trade shall forbid the payment of patronage dividends by co-operative ass'ns once annually.

The Sec'y of Agriculture is authorized "To make and promulgate such rules and regulations, as IN THE JUDGMENT of the Sec'y of Agriculture are reasonably necessary to effectuate any of the provisions or to accomplish any of the purposes of this act." On this broad grant of power there is no limitation as to hearing of the persons affected or any opportunity to apply to the courts for a review of the regulations before their effective date.

AAA Amendments were discussed with Pres. Roosevelt, Mar. 12, by five food processors including Jas. F. Bell of General Mills, Douglas Stuart of Quaker Oats, Fred Lingham of Federal Mill, Lockport; C. N. Chester of General Foods and Howard Heinz, of the 57 varieties, all of the business advisory council of the Department of Commerce.

Agreement to Handle Grain Thru Elevator Binding

The Supreme Court of Kansas by reversing a decision of the Sedgwick County District Court gave judgment in favor of Fred Mosher against the Kansas Co-operative Wheat Marketing Ass'n for breach of a contract for the use of Mosher's elevator at Kanorado.

The contract provided that the Ass'n give notice before Apr. 1 of its intention not to handle grain of its members thru the elevator. The Ass'n wheat was handled thru the house from 1924 to 1927, when on Apr. 17 the Ass'n gave notice of cancellation of contract. The Supreme Court held that the notice was too late and did not abrogate the contract. Mosher was given judgment for \$1,011.58 with interest at 6 per cent from Apr. 23, 1927.—15 *Pac. Rep.* 421.

Liability of Bonding Company

The Supreme Court of Oregon on July 31, 1934, decided against the American Surety Co. of New York in its attempt to cancel warehouse receipts for wheat issued by the Fischer Warehouse Co. to avoid liability on a warehouse bond issued to the State of Oregon on Oct. 5, 1926.

Some 3,000 bus. of wheat delivered by Cawrse Bros., farmers, in 1930 and 1931, is alleged to have been converted to its own use by the Warehouse Co. on Jan. 15, 1931.

The question was whether the Warehouse Co. received the grain as a warehouseman, or as a factor to sell for account of depositor, if the latter the surety would not be liable. The Supreme Court affirmed the decision of the Circuit Court of Marion County dismissing the equitable defense of the surety company. 35 *Pac.* (2d) 487.

Notice to Shippers Not Mandatory Unless in B/L

The Trinidad Bean & Elevator Co. shipped two cars of beans from Idaho to Philadelphia, Pa., arriving Feb. 26 and Mar. 9, 1929. The notify party, Elkan B. Marks, was notified, but refused to take the goods.

No information was sent shipper until his inquiry, when he was told the cars were on hand at the Pennsylvania Warehouse & Safe Deposit Co. as agent of the carrier, awaiting surrender of the Bs/L.

Shipper then sold the beans and brot suit against the Pennsylvania R. R. Co. for \$1,329.46 damages for failure to notify. The judgment in shipper's favor for this amount was virtually reversed Aug. 2, 1933, by the U. S. District Court granting the railroad company a new trial because there was nothing in the B/L requiring shipper to be notified.—8 *Fed. Supp.* 888.

Freight Undercharge Thru Changed Routing

The Saginaw Milling Co. on Nov. 2, 1927, delivered 400 bags of beans to the Pere Marquette Ry. at Saginaw, Mich., consigned to its own order at Napoleonville, La., notify Consolidated Cos.

Before the shipment moved consignor which had routed via Texas & Pacific changed to read Southern Pacific, by telephone and letter; but the B/L had been mailed out. The shipment was moved over the original routing at a freight rate of 91½¢ whereas the charge via the Southern Pacific would have been 71½¢ per 100 lbs. The buyer paid \$288.15 and the Texas & Pacific brought suit for \$100.74 undercharge, but the Supreme Court of Louisiana ruled against it May 21, 1934, because the word in the tariff covering surrender of B/L for change in routing was "should" be surrendered, thus being merely directory. To have held the shipper the tariff should have read "must" be surrendered.—156 *Southern Rep.* 215.

Asked—Answered

[Readers who fail to find trade information desired should send query for free publication here. The experience of your brother dealers is worth consulting. Replies to queries are solicited.]

Rule on Wire Notice of Shipment's Refusal

Grain & Feed Journals: Can the railroad charge demurrage on a refused shipment when shipper's notice from railroad of refusal was delayed? The railroad company claims notice was not required to be wired as the station agent at destination did not know the shipper, as the B/L was not filed in on the line for the permanent post office address of the shipper. The shipper was located at point of origin of the carload. The agent at destination waited 30 days before mailing notice to consignor.—J. M. Buckley.

Ans.: The charging of demurrage is governed by paragraph 2 (b) of Section E, of Rule 4 of Agent Jones' Tariff No. 4-N, I. C. C. No. 2639, containing the car demurrage rules and charges, providing that except where non-perishable carload freight has not been disposed of and remains on hand undelivered at the expiration of five days (exclusive of Sundays and legal holidays) from the first 7:00 a. m. after the day on which notice of arrival has been sent or given to the consignee or party entitled to receive same, a notice to that effect shall within 24 hours thereafter be sent by wire to the consignor or owner, when known, or when not known, to the agent at point of shipment, who shall promptly notify the consignor, if known.

Paragraph 4, of Section D, of Rule 8 provides that in case of failure of a railroad to send notice in accordance with the provisions of Rule 4, Section E, the consignor shall not be held liable for demurrage charges between the date the notice should have been sent and the date it was actually sent; provided that if, thru error, notice is transmitted by mail instead of by wire, this waiver of liability for demurrage charges shall terminate on the date such mailed notice is received by the consignor.

The accrual of demurrage is determined by the date of receipt of the mailed notice, carrier's reason for not sending wire notice having no bearing on the question.

Coming Conventions

Trade conventions are always worth while, as they afford live, progressive grain dealers a chance to meet other merchants from the same industry. You can not afford to pass up these opportunities to cultivate friendly relations and profit by the experience and study of others.

Mar. 30, 31, Apr. 1, 2. Society of Grain Elevator Superintendents, Hotel Sherman, Chicago, Ill.

Apr. 17, 18. Western Grain & Feed Dealers' Ass'n, Des Moines, Ia.

May 14, 15. Illinois Grain Dealers' Ass'n, Hotel Jefferson, Peoria, Ill.

May 31, June 1. Pacific States Seedsmen's Ass'n, Seattle, Wash.

May 31, June 1. American Feed Manufacturers' Ass'n at French Lick Springs Hotel, French Lick, Ind.

June 12, 13. Ohio Grain, Mill & Feed Dealers Ass'n, Columbus, O., Deshler-Wallick Hotel.

June 20, 21, 22. Southern Seedsmen's Ass'n, Louisville, Ky.

June 24. Farm Seed Group of Seed Trade Ass'n at Deshler-Wallick Hotel, Columbus, O.

June 24, 27. American Seed Trade Ass'n, Deshler-Wallick Hotel, Columbus, O.

Sept. 19, 20, 21. Grain & Feed Dealers National Ass'n, Jefferson Hotel, St. Louis, Mo. National Hay Ass'n at Toledo, O. Date not selected.

New York State Hay & Grain Dealers Ass'n at DeWitt Clinton Hotel, Albany, N. Y., in August.

A.A.A. Amendments Not Read by Wallace

When Sec'y of Agriculture Wallace was called to testify before the House Comite on Agriculture on the amendments to the Agricultural Adjustment Act he said he had no prepared statement and could not speak in detail on the legislation because he did not know until that morning that he would appear and read the amendments after receiving the invitation.

If he apparently disclaims responsibility for the proposals who is the real author of these objectionable bills.

Argentina Too Wise to Hold

The far sighted grain regulatory board of the Argentine government in its first annual report recently published state that:

We have always sold the whole of our harvest at the world price without attempting the retention of even a part. This country cannot give up this salutary policy in order to fall into the experiments which in other countries have turned out so disastrously. . . .

The Board stated on its inception that it did not purpose to control or restrain the offers of Argentine grain, either with the intention of giving a tonic to world prices or in the hope of selling at better prices in future. That this would be a speculative attitude and the board desired to avoid speculation at all costs, having learnt the lesson from the ruin which the policy of withholding grain has produced in other countries. The event has proved fully the wisdom of these decisions. The board has bought wheat and has sold it.

Grain Imports

Steamer "Emergency Aid" brought in 500 tons of corn from the River Plate to Portland, Ore.—F. K. H.

Steamer Scanstates is due at Boston this week from Danzig, Poland, with 1,000 tons of oats for Boston and another 1,000 tons for optional discharge at Boston, Philadelphia or New York.—L. S.

A shipment of 4,480 bags bran, weighing 460,480 lb., arrived at Boston Mar. 20, from Buenos Aires on the steamer Zouave. Also on board were 8,684 bg. linseed weighing 1,120,000 lb.—L. S.

Charters reported Mar. 20 were two steamers, one for 6,500 tons of oats from Braila on the Danube for the United States via Montreal, and one for 5,500 tons grain from Rosario, Argentina.

Argentine oats in small lots were received last week at New York, Mobile and Galveston, the total being 300,000 bus. Recent clearances from Argentina include 958,000 bus. of oats for the United States.

Falling domestic prices of grains since the middle of February operated against the working of new imports. On Mar. 19, however, all the commodity and security markets got into strong positions and if the rise continues as expected imports may be resumed on a large scale.

Feeding cattle in foreign countries and shipping the meat to the United States diminishes the imports of grain and feed. A whole train of 29 cars of cattle recently arrived at Chicago from Alberta, Canada, paying the duty of \$3 per 100 lbs. Heavy imports of New Zealand butter decrease the need for dairy feeds in the Eastern States.

Attractive Program of Terminal Elevatormen

An attractive program is announced by President Wm. H. Gassler of the Society of Grain Elevator Superintendents of North America, scheduled for March 30 to April 2, inclusive. Open discussions throughout the entire program will be a feature this year, he says.

Barley and its various factors influencing purchases by maltsters will be discussed at the first day's session in the Schroeder Hotel, Milwaukee, March 30. Varieties, strains preferred for malting, grading, testing barley for mellowness, differentiating between 2-row and 6-row barley, sizing, diseases and how to detect them (including moulds, helminthosporium blight, gibberella and fusarium), method of determining heat damage and dockage, storage factors, special binning, movement, and peculiarities of barley dust, will be discussed. Among those invited to speak at this session are John J. Murphy, Bartlett-Frazier Co., Chicago; Dr. James G. Dickson, University of Wisconsin, and Chris Kurth, Jr., Kurth Malting Co., Milwaukee.

At the noon luncheon M. H. Ladd, Chief Weighmaster of the Milwaukee Grain & Stock Exchange, will discuss "Weighing Problems."

Saturday afternoon will be devoted to an inspection of the new Froedtert malt plant in Milwaukee.

Saturday evening is set aside for a business meeting at the Sherman Hotel, Chicago, the headquarters of the annual convention.

Dust explosions in a model elevator and in a model leg will be demonstrated Sunday afternoon, March 31, by Hylton R. Brown, U. S. D. A., Washington, D. C., and everyone attending is invited to bring samples of various grain dusts from their own plants for individual experiments. Pointers on preventing loss of lives, jobs and property, observations by those experiencing recent blasts, fumigants as the cause of explosions, static, ventilation, lining metal legs with rubber belt to avoid sparks, wire cable on car puller as source of sparks, and a myriad of kindred thoughts will be thoroughly analyzed.

Sunday evening is set aside for directors' and com'ite meetings.

SOY BEANS will command all attention Monday morning when the chemical constituency, handling and storing factors, effect of improper storage on products manufactured, proper machinery for preparing beans for storage and future prospects of terminal market storage will be discussed by those well versed in the subject. A trip through a new modern plant is also being arranged. Fred'k Wand of The Glidden Co., Cleveland, O., will open this subject.

Barney Snow, eminent crop statistician of Chicago, will open the Monday afternoon program in the House on the Roof of the Sherman Hotel on "The Prospects for a Heavy Movement Year."

Discussion on grain grades and new moisture testing equipment will follow, led by J. E. Klingenberg of Cargill Grain Co., Minneapolis, and C. L. Cannon, Federal Supervisor at Chicago.

Under the caption of "Grain Handling and Conditioning," Dick Uhlmann will speak on methods employed abroad. Lewis T. Sayre, well-known Chicago Board of Trade personality, is slated to follow with his ideas on some of the unsolved mysteries in grain handling and conditioning. Eliminating heating, sweating causes, aeration, absorption, chilling without turning, carrying corn through the summer, ideas for improving grain handling and conditioning, car unloading improvements, weighing problems, research on grain treatment will be discussed.

Monday evening, promptly at 7, the Knights of the Robot will hold mock court, and it is expected that many guilty and innocent Superintendents and Managers will be humorously convicted through miscarriage of justice. A buffet luncheon will be served all members in good standing, followed by an evening of wisdom, wit and laughter.

TUESDAY morning calls for a business meeting, election of officers, com'ite reports, and unfinished business.

Tuesday afternoon will be devoted to plant maintenance and operation, including such matters as power transmission problems, practical engineering, lubrication, waterproofing, anti-choke devices, specific attention requirements of belts for longer life, keeping plants clean at minimum cost, lowering power bills, determining whether your plant is over-powered, and like topics of importance will precede discussion of accident and injury prevention, building loyalty, training the new employee, analyzing last year's accidents, etc.

Rail rates of a fare and a third in western territory are available. Those from the east should bring a receipt for the one-way fare on the yellow "convention certificate" receipt blanks, Mr. Gassler suggests, and says, "We're looking for a splendid turnout."

The Agricultural Situation

By NAT C. MURRAY, Chicago.

The United States cannot properly be classed as an agricultural nation. Less than 30% of its population gainfully occupied, is engaged in agricultural pursuits. This percentage compares with about 45% for all of Europe. Only Great Britain, Belgium and possibly Holland have smaller percentages than the United States of their people engaged in agriculture. The data upon which these comparisons are based, relate to the early part of the present century, but they are approximately applicable to the present time. Such changes as have occurred have been toward a still smaller proportion engaged in agriculture in the United States.

The United States is a net importer of agricultural products, expressed in values. It changed from a net exporter to importer about 15 years ago.

Our evolution from an agricultural to an industrial nation has been gradual but fairly steady. Seventy-five years ago 80% in value of all our exports consisted of agricultural products; in recent years the proportion has been under 40%, and nearly half of this has consisted of cotton. Our imports of agricultural products, on the other hand, have been increasing though irregularly; in recent years our imports of agricultural products have been more than half of our total imports. Sixty or seventy years ago they were under 40% of our total imports.

Our exports of agricultural products are about 10% of our production. If we limit our comparison to food products alone, the percentage is reduced to about 5%. Even before the war our exports of foodstuffs were less than 8% of our total production of foodstuffs, and was less than the value of our imports of foodstuffs at that time.

During the present century, that is, since 1900, agriculture has gone through four fairly distinct economic phases or periods. The first extended to 1914, or to the outbreak of the world war. The second included the war period. The third covered most of the decade of the twenties; and the last period covers the past five years of depression.

In the first period, 1900-1914, agricultural production was expanding, but demands for agricultural products were expanding more rapidly; food prices increased and we heard much of the high cost of living.

The war period, familiar to all of us, increased demands in exporting countries, inflated prices, and soon after the close of the war a collapse of inflated prices. During this period many farmers went into debt buying farm lands at inflated prices, later losing their equities in the farms when the inflated prices collapsed. Tenant farmers who had bought farms at war prices, largely with borrowed money, were forced back to tenant farming.

The third period, that is the period of the twenties, is marked by organized efforts of farm interests to maintain the advantages which the war brought to agriculture. A farm bloc was formed in congress. The first efforts in this period to improve agricultural conditions by political measures was crystallized in the McNary-Haugen bill, in 1922-23. This measure, in essence, would put the sale of certain farm products under government control. Domestic prices would be raised, surplus would be sold abroad. The loss from export sales, measured from the domestic level of prices, would be assessed upon producers. Such losses would be only a small part of the gain from the higher controlled price of the portion sold for domestic use. This is the measure that was twice vetoed by President Coolidge. But the agitation continued.

Henry Wallace, in his recent book, "New Frontiers," says: "To fully half the population of the United States the continued agitation for

farm relief legislation in the years 1924-29 doubtless seemed wholly unnecessary. The fat years were here. The McNary-Haugen leaders did not see things that way. They knew that farm prices, though better in relationship to industrial prices than in 1921, were still too low. High land values, high debts, high taxes and a host of rigid production and living costs remained to plague the farmer."

To my way of thinking the farmer agitation in the twenties was not due so much to distress or depression, as it was to a growing aspiration for a higher physical or economic standard of living. For more than a generation the agricultural colleges of the country were raising the intellectual standard of the farmer element of the nation. It seems to me only natural that these college men on the farm should aspire for more and more of the things produced by the industrial or urban populations, which symbolizes the higher physical standard of living, such as autos, radios, improved lighting, heating and water systems in their homes.

The Standard of Living of farmers of the United States surpasses by far, the standard of any other country. A few statistical comparisons here may be given to indicate this. The number of telephones on farms of the United States exceeds the total number of all telephones in the two continents of Asia and Africa combined, or about the same as the total in these continents and South America added. The number of automobiles owned by farmers of the United States in 1930 exceeded the total number of automobiles in the world outside the United States, excluding only France, England and Canada. The farmers are making rapid strides in the electrification of their farms, even in recent years of general depression. Thus from 1925 to 1933, the number of farms electrified increased from 246,000 to 713,500, that is, nearly trebled; in the same period the total number of customers of electricity increased only 32%.

In the Hoover-Smith presidential campaign the farmer agitation was so prominently featured that Hoover made campaign pledges to act immediately if elected. The outcome was the establishment of the federal farm board with \$500,000,000. The farm board directed its power and energies mainly along two lines; one, to establish stabilization corporations to control the price level; and the other, to aid and promote farmers' cooperative marketing organizations.

Many persons erroneously believed that big speculators are able to put prices up or down almost at will and, therefore, that the government with hundreds of millions of dollars, could dictate the price. The board had some influence on prices, temporarily by withholding millions of bushels of wheat off the market, but ultimately it went broke. In regard to cooperative marketing organizations, it was scarcely more successful. It attempted compulsory forms of organizations which conflicted with older voluntary cooperative associations. Also, Mr. Legge, the head of the farm board, admitted that, as to grain, farmers, cooperative marketing organizations could save, at best, only a cent or two a bushel, in the cost of marketing his product. So the end of the Hoover administration was the end of the farm board, with few friends or advocates even among the farm leaders. It was succeeded by the Agricultural Adjustment Act (AAA) enacted soon after the present administration, and which we have with us today.

A Purpose of the Agricultural Adjustment Act is stated in Section 2, as follows: "It is hereby declared to be the policy of congress—(1) to establish and maintain such balance between production and consumption of agricul-

tural commodities, and such marketing conditions therefore as will establish prices to farmers at a level that will give agricultural commodities a purchasing power, with respect to articles that farmers buy, equivalent to the purchasing power of agricultural commodities in the base period. The base period in the case of all agricultural commodities except tobacco shall be the pre-war period, August, 1909-July, 1914. In the case of tobacco the base period shall be the post war period, August, 1919-July, 1929.

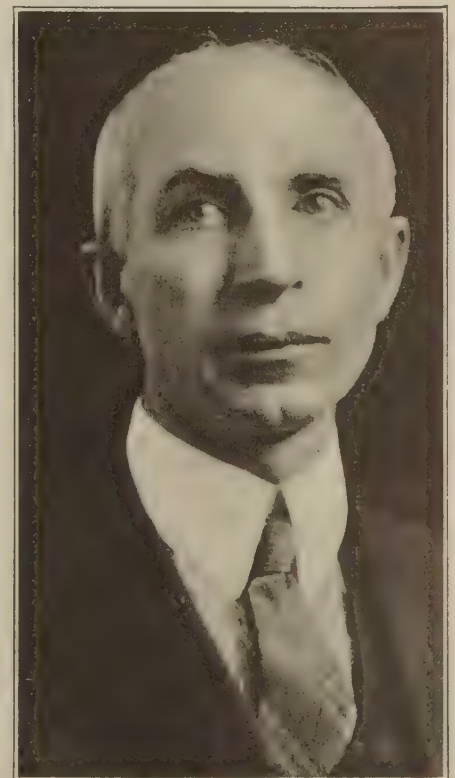
It may be pertinent to inquire why the parity price period for tobacco should be the ten year, 1919-1929; and for other commodities, the five year period 1909-14. Locking up the records we find that tobacco prices were the highest on record during this period 1919-29—more than twice as high as during the base period 1909-14, used for other commodities. As to the general base period 1909-14, we find that the prices of agricultural products were then higher, in relation to the all commodity price level, than in any previous decade of our history.

During the decade of the twenties, the period of farm agitation, prices of agricultural products, in relation to prices of all commodities, were higher than in any decade of our history previous to the past two decades. Yet this period of the twenties was the period of the so-called farm problem agitation and legislation. We heard of the loss of our export trade of agricultural products; yet the volume of our agricultural exports in the twenties exceeded the volume of agricultural exports in the base period 1909-14.

Much was said and written about the reduced horse population, due to the auto, releasing land previously needed for horse feed, to swell the production of food crops. However the increase in the urban population has been greater than the decrease in horse population, in agricultural output requirements.

The farm population of the United States has remained almost unchanged since 1910, in fact has moderately decreased; but the urban population has increased about 60% from 1910 to 1930. The output per farmer has increased. According to Secretary Wallace "Science has made it possible for American agriculture since

[Concluded on page 242.]



Nat. C. Murray, Chicago.

Letters from the Trade

[The grain dealers' forum for the discussion of grain trade problems, practices and needed reforms or improvements. When you have anything to say of interest to members of the grain trade, send it to the Journals for publication.]

Regulation Hurts Small Mills

Grain & Feed Journals: After losing hundreds of dollars trying to operate under the code, A. A. A. and N. R. A., including encouragement to employees to be straight loafers, I closed my mill 15 months ago, to stay closed as long as Tugwell, Wallace and others can dictate just what I can and cannot do.

Compliance would require a small mill to employ an accountant and an auditor and no mill of this size can afford it.

I have operated a small mill for 20 years, for the benefit of the country.

Picture a farmer coming to mill several miles with a load of wheat, entitled to 1,000 lbs. flour, but having no place to keep it, stored it in the mill, flour to be taken as needed, with delivery not permitted to any member of the family but the one signing the affidavit of producer. Even a 25 or 50-lb. delivery requires an affidavit with either two witnesses or a notary's seal, neither of which are available without considerable trouble.—G. W. Healy, prop. Pima Milling Co., Pima, Ariz.

Confidence vs. Paralysis

Recovery on a broad scale cannot return until full confidence has been restored among that part of the population which initiates and vitalizes economic movements. This does not mean big business leaders, but the body of men, large and small, rich and poor, who by temperament and character give leadership to commerce. Threats of bad laws are paralyzing the activities of this group.

Apportioning Proceeds of Rice Tax

All growers of rice will be taxed 1 cent per pound, effective Apr. 1, and collected thru processors, under an amendment to the A. A. A.

Growers of rice who agree to the A. A. A. program of reduction will receive "adjustment payments." Those who do not sign up will get no money back. The A. A. A. announcement of Mar. 19 follows:

Adjustment payments to co-operating producers will be made on 85% of their quotas, since no processing tax income is derived from the 15% which ordinarily is used for seed or exported.

Growers who plant as much as 85% of their acreage allotments and not more than 100%, will receive full adjustment payments on 85% of their production quotas. Those who plant less than 85% of their acreage allotment will receive proportionately smaller payments. For example: A grower with an acreage allotment of 100 acres and a production quota of 1,000 barrels will receive payments on 850 barrels, provided he plants as much as 85 acres and not more than 100 acres. If he plants 80 acres, his payments will be based on 800 barrels, and if he plants 50 acres, his payments will be based on 500 barrels. Acreage will be measured in order to determine compliance, and if the acreage planted exceeds 100% of the acreage allotment, the producer will be given an opportunity to retire the excess acreage from production in order to comply with his contract.

Adjustment payments will be made in two installments. The first payment will be 81 cents a barrel on 85% of the production quota, after acreage compliance has been checked, that is, as soon after Aug. 1, 1935, as practicable. A second payment, the amount of which will depend upon the revenue from the processing tax, the amount necessary for rebates on exports, and the cost of administration will be made as soon after Dec. 1, 1935, as practicable. All producers with rice production histories will be given an opportunity to participate.

The purpose of the program is to adjust production to the current level of consumption and further to liquidate the surplus of rice stocks now in the hands of growers and millers.

From Abroad

A port strike at San Lorenzo, Argentina, recently, threatened to delay grain exports.

South Africa's 1935 corn crop is estimated at 70,000,000 bus., against 85,000,000 bus. last year, making available for export 20,000,000 to 25,000,000.

Italy will promote cultivation of soybeans as food, employing a new process whereby the beans can be made palatable and suitable for the everyday requirements of the people.

France and the United States on Mar 23 announced France will increase its apple quota from the United States by 7 million bus. in return for an agreement on the part of the United States to accept a large quantity of French feeding wheat. This competition will be felt by domestic wheat growers, especially those of the Pacific Northwest, where a surplus exists, as well as by producers of feed which the French wheat will supplant. A Kansas City grain firm which in previous years did a large export business the same day received a cable from Paris asking for bids on crushed wheat containing 5% linseed meal, ground nut meal or molasses.

Loveland, Iowa, Has New Elevator

To replace the elevator that burned the Loveland Elevator Co. has built a new cribbed, iron-clad structure on a concrete foundation, over a full basement, at Loveland, Ia.

The new elevator is 32x30 ft., 35 ft. to the plate, 70 ft. to the ridge. Its cribbing is of 2x6s for the first 20 ft., then 2x4s to the plate. Five bins and the dump sink provide storage room for 12,000 bus. Four of the bins are deep. The bin over the work floor is used principally for a shipping garner.

The frame cupola is 10x20 ft., 35 ft. high. In it is the elevator head and distributing spouts. The leg encloses a 12 in. rubber covered cup belt, carrying 10x6 in. V cups set on 8 in. centers. It is run by a 10 h.p. GE motor thru



12,000 bus. Elevator at Loveland, Ia.

a belt to the jack-shaft, then a chain to the sprocket on the head shaft.

The 32x12 ft. driveway is attached to the main structure with sliding members that prevent distortion of the driveway as the cribbing settles. In the driveway is a pneumatic truck lift and concrete hoppers dump sink with trap-door cover. The door at the entrance and exit roll on an overhead rail.

Just before the entrance to the driveway is the 18 ft. platform of a 10 ton truck scale, the beam of which is housed in a 16x12 ft. office adjacent.

The Loveland Elevator Co. is part of the line operated by Francis Day from California Junction. The local manager is R. C. Reddix.

Nebraska Millers Oppose A.A.A. Licensing

Under call of the Nebraska Millers Ass'n twenty-five Nebraska millers held a meeting at the Hotel Clarke, Hastings, Mar. 23, to discuss code matters and the price demoralization in flour sales.

The millers agreed that in the computation of a price basis a flat factor of \$1.00 per barrel was a fair charge to cover conversion costs and selling expense; and that 40 cents per barrel should be fair average charge for delivery by truck up to 75 miles.

Reports from over the territory show that old wheat is scarce and the millers without ample storage are finding it difficult to keep a supply on hand. Until new wheat comes on the market the exchange business is bound to be light.

Among the resolutions adopted were the following:

RESOLVED, that we are unalterably opposed to the thirty-hour week for labor.

RESOLVED, that we are opposed to the amendment proposed to the Agricultural Adjustment Act which might be used as authority to put mills under a licensing system.

RESOLVED, that the abandonment of the present milling-in-transit rules would be most injurious to western manufacturing industries and that no effort should be spared by the mills in an endeavor to retain this distributive practice as an inherent right.

Trade Agreements a Bitter Disappointment

We fear that Secretary Hull's foreign trade agreements are not going to be worth much, so far as increasing our exports of flour are concerned. At least that comment seems to be warranted after a study of the treaties negotiated with Brazil and Belgium. In neither case is there any modification of the present tariffs and restrictions now in effect against the importation of wheat or flour from the United States. In return for various tariff reductions by the United States these countries have reduced certain tariffs, principally those which stand in the way of machinery imports from our country.

Omission of flour from the Brazilian treaty is almost indefensible. For many years prior to 1931 the United States shipped Brazil in excess of 800,000 barrels annually and flour was one of the chief items in our exports to that nation. Despite strong representations by the Federation the State Department has been unable or unwilling to obtain any arrangements in the trade treaty which would open the way to a restoration of our once large volume of export flour business with Brazil.

While Belgium has never been an important outlet for American flour, the records show that only six years ago she imported more than \$8,000,000 worth of American wheat and flour and these commodities were fourth in the list. Since that time our wheat and flour trade with Belgium has disappeared on account of restrictions, etc., but the new Belgium treaty makes no provision for the elimination or reduction of these restrictions.—*The Hookup* of Millers' National Federation.

Effect of Wheat Consumption on World Prices

[From an address by W. Sanford Evans, Winnipeg, before the Assn. of Grain Commission Merchants.]

I have been invited to consider the wheat problem from the point of view of the part played by consumers. Generally, and particularly in countries where wheat is an important crop, the approach is from the standpoint of producers or of marketing agencies. But demand, which is the contribution of consumers, is one of the two fundamental elements of the whole problem. Without demand, supply is valueless and there will be no trade and therefore no markets.

Prices result from the interplay of opposite forces. They are, as we say, the resultant of the pressure of supply against the pressure of demand as both are modified by the many different agencies through which they are exercised and by changing general conditions. Where there is thus a joint product no one factor can be selected as the sole determining cause, but for all practical purposes the part played by consumers in the making of prices is so important that they may be regarded as the final arbiters of market values. They are so many in numbers, so uncoordinated and so uncompellable as a mass that their aggregate reactions must be accepted as a great basic fact to which marketing must accommodate itself.

Who or what are the consumers of wheat? Pre-eminently first are human beings. In a good year the world produces about 5½ billion bushels of wheat. If we strike off, say, a billion bushels for other purposes, including seed, the main use of the remaining 4½ billion bushels is for conversion into human food. In this process varying proportions up to 30 per cent may be separated as not desirable human food, and this large residue, in the form of bran and shorts, becomes one of the most valuable feeds for livestock, and particularly for milch cattle. Of wheat that does not go to the mill and is not used for seed, animals, among which poultry probably easily stand first, are the main consumers.

In the world are a little over 2 billion human beings and the wheat available for milling would give every man, woman and child about one-half of a barrel of flour per year. In North America human consumption is approximately one barrel per head per year. In Europe it is a little higher than this, but in the greater part of the rest of the world consumption does not reach a half barrel per head. There is, however, no continent in which wheat is not a prominent item in human diet. Even Asia, which grows most of the rice of the world, produces something like a billion and a quarter bushels of wheat per year and is besides a net importer of wheat and flour, and thus uses approximately a quarter of a barrel per year per head of its vast population.

What value will human consumers give in exchange for wheat; that is, what price will they pay? Obviously a great many considerations will be involved. A full analysis of the psychology of buying, or a listing of all the different practical conditions that may influence choice, need not be undertaken. For the present purpose, three general considerations only may be mentioned, which will probably be accepted as almost self-evident and which can readily be supported from the history of marketing:

1. What consumers will pay will be measured by them in relation to their incomes. Man has many desires, but in satisfaction of them all he cannot give more than his income. A thing is dear or cheap to an individual in accordance with the proportion of his total spending

power it calls for. Purchasing power at any particular time is therefore a factor.

2. In arriving at the maximum proportion of income to be spent on any one commodity or service, a man will weigh against it other needs or desires, in order of their urgency, and will consider the suitability of possible substitutes and the disadvantages or dangers of doing without that particular satisfaction altogether. Prices are judged relatively to the value placed on other things.

3. Price cannot rightly be judged except in relation to total quantities. Under reasonably free world market conditions, it is the aggregate, or the average demand in relation to the total available supply that will determine the price level, which will tend to become a common price level.

A wealthy aviator who had crashed in the wilds might gladly pay thousands of dollars for a loaf of bread and the price might represent only a moderate proportion of his income, but this incident could not establish a world price for bread. If there were a world dictator he might today set a price of \$100 a bushel for wheat and some wheat could be sold at that price. A certain number of individuals could afford to gratify their taste for wheat at such a price without sacrifice of any other important desire, but only a very small fraction of the world's supply could possibly be sold at that price.

To dispose of more it would be necessary that the price should come down in order to bring in an additional class of consumers. At \$50 per bushel many more buyers would undoubtedly appear, but again the total sold would be an insignificant part of the whole. As step by step the price came down, larger and larger sales could be made, partly by the bringing in at each step of a new class of consumers and partly by encouraging freer use in the classes already customers.

To dispose of the total supply, the above process would have to go on until enough buyers had been attracted and the use was free enough to absorb the quantities available. A dictator may fix arbitrary prices but even a dictator cannot sell a world crop of wheat except by bringing down the price to that which a sufficient number of individuals can and will pay.

In an open market exactly the same necessity exists for arriving at the practically effective price, but the process goes on almost automatically. By a continuous series of exploratory approaches or retreats, the price line feels its way to the effective level. On other occasions I have set forth the facts of average world prices in relation to quantities and to the value of money for a series of years under open conditions, and these facts demonstrate that the inevitable adjustment has actually been carried out, and with a certainty and lack of disturbance that could not be expected under a dictatorship.

Except in times of war and of general economic collapse or when governments have imposed artificial restrictions, a proof of successful adjustment would seem to be found in the fact that excess carryovers have been almost unknown while supplies have never run short at any season for those prepared to pay the ruling price. It is true there are some in the markets who may attempt to make an arbitrary price for their own gain and temporary disturbance may be caused, but on looking back on the facts the distortions of trend are seen to have been temporary only and to have had much less influence on the average level for a season than many have supposed. No speculator can

do what is even beyond the power of a dictator with governmental authority.

All cash handlers are Bulls: While prices cannot stay up if consumers will not take the quantity at the price, the facts show that prices will not long stay too low. There are too many always trying to obtain an extra fraction in selling. This is true among speculators and it must be remembered that every handler of cash wheat and flour, from the producer right through to the grocer, is a "long," and not only has no interest in a decline in price, even if he has a hedge out, but generally has a very direct interest in getting the highest possible price when he sells.

With a given quantity of a commodity and a given volume and intensity of demand, the natural and in this sense the proper price is the highest unit price at which the whole supply will pass into consumption in an orderly manner as consumption takes place.

The price that influences the consumer, it should be borne in mind, is the price to him and not that at any other point in the process. Ordinarily the charges for all services in transporting, financing and processing wheat between the producer and the ultimate consumer are low, being kept so by competition and by the facilities provided in the marketing system for insuring both purchases and sales in the futures market. Artificial elements of cost may, however, be interposed. The extreme tariffs, quotas, exchange restrictions, processing taxes, etc., now in existence are increasing to consumers, to the extent in some countries of doubling or even trebling, the price that would normally correspond to the amount paid the producer, plus necessary services. The effective price of wheat is no longer therefore the price ruling in the great primary markets. Wheat today is at a luxury price level in many parts of the world, while producers in other parts may be receiving a disproportionately low return.

Questions may arise in the mind as to why there should be much effect on demand of changes in price, since a wheat ration for a year does not cost much in any case, and how it is that changes in consumer demand seem to reflect themselves so promptly to the markets.

A variation in the consumption of wheat may very easily happen. There are innumerable foodstuffs and under ordinary conditions, many are always as available as wheat. Rice, rye flour, cornmeal, oatmeal, potatoes, vegetables, dairy products, meats—an extra service of anyone of these staples can easily be substituted for the slice of wheaten bread or pastry customarily eaten at any meal. Or an occasional slice of bread can be omitted from the diet without substitute, if there be a mood for economy, and no harm will come, for we are told that too much is generally eaten. In the same mood, many a tasty dish can be made of the crusts and crumbs that ordinarily do not find their way back to the table. The great majority of consumers have strictly limited incomes which have to be budgeted among necessities and a change of even a moderate per cent in the cost of any one item in this budget is a matter of concern calling for some replanning. Then there are all the marginal users who cannot spend more or would just as soon have something else. Outside of human consumers, even a few cents difference in price may determine whether a man will feed wheat to his chickens or not, and any year in which poultry cease to be consumers of wheat the world would have an excess carryover of many millions of bushels.

Tracing wheat as a human food back from the consumer to the producer, the first agency immediately back of the table at meal time is the housewife or caterer, who buys wheat in the form of flour from the grocer or bread from the baker. Normally, the housewife buys only in moderate quantities at any one time but buys regularly. Bread will become hard if kept too long and flour may be subject to damage. Flour, bread, and pastry

[Concluded on page 243]

Crop Reports

Reports on the acreage, condition and yield of grain and field seeds.

Evansville, Ind., Mar. 15.—Recent high water along the lower Ohio River and its tributaries covered a great deal of growing wheat, but as far as can be ascertained, no serious damage was done to the crop. Growing wheat on the hilly land is looking exceptionally good.—W. B. C.

Hastings, Neb., Mar. 23.—At a meeting of the Nebraska Millers Ass'n held in this city to-day it was the opinion of those present that along the south line of the state in central and western Nebraska the growing wheat has suffered considerable damage. The western part of the state to spring winds have blown out and covered up a large part of the wheat. From the central part of the state eastward the fields show up well and promise a good crop with the usual rainfall to promote growth.—J. N. Campbell, Sec'y.

Winchester, Ind., Mar. 25.—Winter wheat is small, but a beautiful green in color and apparently a good stand. Young clover we believe will show about one-third of a stand; most of it was killed out last Summer. Oats acreage promises to be about normal; however, we are fearful that unless conditions are perfect many of the oats they are using for seed will not produce. In spite of the fact that about the same number signed up on the corn reduction acreage, we believe we shall have a larger acreage than last year.—Goodrich Bros. Co.

Madison, Wis., Mar. 26.—Wisconsin's grain acreage will rise sharply this year. Oats, of which a considerable acreage was lost in last year's drouth, will probably be increased about 9%, bringing the state's oat acreage near the average. The state's barley acreage will be increased about 18%, which will bring the barley acreage to a new high point of 874,000 acres, which is more than 50,000 acres above the previous high point in barley acreage made in 1909. Spring wheat is also expected to increase by about 10%.—Walter H. Ebling, sr. ag. statistician.

Springfield, Ill., Mar. 20.—Precipitation was light this week, but the soil has ample moisture. Wet surface soil is generally delaying field work, particularly plowing and sowing of oats; however, drying winds are helping the situation. There is some flooding in two or three west-central and extreme southern counties. Weather conditions favored improvement of winter grains, meadows and pastures, and fields are greening into the northern division. Winter wheat condition is now mostly good. The feed shortage is most acute in parts of the northern division.—E. W. Holcomb, U. S. Dept. of Ag.

Chicago, Ill., Mar. 16.—In Kansas east of a line north and south thru Salina, a crop better than normal is probable with reasonably good weather. Between the north and south lines thru Salina and Ellis, the prospect ranges from good down to a half crop or less. Subsoil moisture is lacking and the outcome will vary widely depending upon the amount of rainfall from now until harvest. Normal rains probably would not produce better than three-fourths of a normal crop. In the southern half of this north and south belt across the center of the state, prospects are good to fair as far west as St. John, Pratt and Great Bend. The northern part is substantially poorer, with a chance of 50 to 60 per cent of a normal crop. The western third of the state beyond Wakeeney, Ellis, Pratt and St. John is quite poor and even with seasonable rains will not produce much wheat. The two western tiers of counties are largely a complete failure. Southwest Kansas is much the same as last year, except that the north and south line, west of which the wheat is poor, is about 40 miles farther west than last year. Specific forecasts of the Kansas crop were mostly around 100 million bus., assuming timely rains. A few observers expect that the state will finally turn out up to 125 million bus. In 1934, the April 1 forecast was 124 million bus. and the final yield was 80 million bus.—Gilbert Gusler, statistician Millers National Federation.

Tippecanoe, Ind., Mar. 19.—Wheat is greening up nicely on a somewhat larger acreage in this territory than was harvested last year.—C. M. Urschel, Urschel Bros.

Hoagland, Ind., Mar. 21.—Wheat looks good. Acreage is slightly reduced. Plans of farmers call for a normal acreage of oats to be sown. Last few days have seen a good movement of oats from farmers as they found themselves holding more than their seed requirements.—John Witte, mgr. Farmers Co-op. Elevtr. Co.

Lincoln, Neb., Mar. 16.—Wheat 50 to 60 miles west of this city looks fine and there is plenty of top soil moisture, the subsoil moisture is lacking. Soil is wet down to about 8 or 10 inches in the wheat fields and two to three feet where snow laid in stubble and cornstalk fields. Sixty to 90 miles west of Lincoln winter wheat is looking only fair. Ninety to 125 miles west it is looking rather poor, does not seem to have much life, but it might come out all right with favorable conditions from now on. The snow of Feb. 24 did not do much good as it did not lie where most needed—piled up along the roads and snow fences. The snow of Mar. 5 did not reach very far west and seemed to drift more than it did in the eastern part of the state. Considerable dirt along with the snow.—H. M. Lehr.

Spring Wheat Sowing Restriction Removed

Removal of restrictions on the planting of spring wheat this year for those farmers under wheat allotment contracts, who sign agreements to offset 1935 increases with corresponding reductions next year, was announced Mar. 20 by Sec'y of Agriculture Henry A. Wallace.

The action is intended, for the benefit of both consumers and producers, to anticipate and offset reductions in yield from possible recurrence of drouth in several of the major wheat producing states, where rainfall and subsoil moisture are still subnormal. It applies also to contract signers' plantings of excess winter wheat for pasture purposes. This wheat now may be allowed to mature for harvest by agreement with the Secretary.

The studies of the situation showed that if no changes were made in the present program, the carryover on July 1, 1936, would be from 50 to 185 million bushels, depending upon the extent of possible drouth. However, by lifting restrictions on planting, it was estimated that the carryover on July 1, 1936, would range between 60 million and 210 million bushels, depending upon the weather. In view of our present restricted foreign outlets for wheat, a carryover of 200 million bushels is considered normal, if accompanied by an ever-normal granary plan.

Removal of the restriction is expected to add 2,316,000 acres under normal conditions.

Country's Moisture Decreasing

Ground moisture throughout the United States has been declining consistently during the past three years, declares Charles R. Heath, Chicago seed broker, who believes the Canadian wheat surplus will prove a necessity rather than a burdensome market factor.

Dry subsoil this year will obviously not help the Southwestern farmer who was restrained from sowing normal plantings by the AAA, but who, like the unrestrained Northwestern farmer will receive so-called "benefit payments" for producing nothing. Receiving such "adjustments" is, of course, to be preferred by the shiftless farmer when he can get money this way plus money for selling a bounteous crop, as will perhaps be the case in the Northwest this year with the Government just calling off its "acreage restriction hounds."

Paralleling the Government's misguided crop-reduction efforts is the misinformation issued about seeds, seed corn, etc. Farmers bought seed corn from their neighbors, leaving the seedsmen with a large supply of high priced stocks on hand. "Follow the government or the 'bunch' and you'll always be wrong," Mr. Heath concluded.

Ignoring Experience

Washington is considering proposed laws adding more restrictions to the activities of commodity exchanges and granting new governmental powers over such activities.

Flinging aside the records of past legislative experimentation with sensitive marts of trade, some agitators are urging quick enactment of the commodity exchange bill, the AAA amendments, and a bill guaranteeing farmers cost of production, which in effect is price fixing anew.

Thomas N. Carver, world authority on agricultural economics, as professor of political economy in Harvard University, said prices of grain on organized exchanges "do at any given time reflect the actual supply and demand influences, insofar as they are known by the best experts. Such prices are with infrequent minor exceptions, determined by open and competitive buying and selling."

Arthur Twining Hadley, former president of Yale University, said: "Future trading . . . has tended to stabilize market prices of grain and cause fluctuation in grain prices to become less sudden and less violent than they were before future trading became a practice upon such exchanges."

The February corn grind is reported by the Corn Industries Research Foundation as 3,399,000 bus. by 11 manufacturers, a decrease of 16 per cent from January.

Daily Closing Prices

The daily closing prices for wheat, corn, oats, rye and barley for the May delivery and the high and low of the option to date at the following markets for the past two weeks have been as follows in cents per bushel:

	Wheat		Mar.		Mar.		Mar.		Mar.		Mar.		Mar.		Mar.	
	Option	High	Low	13	14	15	16	17	18	19	20	21	22	23	25	26
Chicago	117	90 1/2	93 3/4	92 3/4	92 3/4	92 3/4	92 1/2	91	91 1/2	93 1/2	94	95 1/4	94	93 3/4	93 3/4	93 3/4
Winnipeg	100 1/2	79 3/4	83 3/4	83 1/2	83 3/4	83 3/4	82 7/8	82 3/4	83 3/4	83 3/4	84 1/4	84 3/4	84 3/4	84 3/4	84 3/4	84 3/4
Liverpool			68 3/4	70 3/4	70 3/4	72 3/4	72 3/4	72 3/4	72 3/4	72 3/4	71 1/2	76 1/4	75	73 3/4	74 1/2	74 1/2
Kansas City	111 1/4	88 3/4	91 1/4	90 3/4	90 3/4	89 3/4	89 3/4	89 3/4	93	92 3/4	93 3/4	93 3/4	93	92 3/4	92 3/4	93
Minneapolis	120 1/2	98 3/4	101 1/2	100 3/4	100 3/4	100 3/4	99 3/4	99 3/4	100 3/4	101 1/2	102 1/2	103 3/4	102 3/4	102 3/4	102 3/4	102 3/4
Duluth, durum	129 3/4	108 3/4	112 1/4	111 1/4	111 1/4	111	108 3/4	107	107 3/4	109 3/4	110 3/4	110 3/4	112	108 3/4	109 3/4	109 3/4
Milwaukee	116 3/4	90 3/4	93 3/4	92 3/4	92 3/4	92 3/4	92	91	91 3/4	93 3/4	94	95 3/4	94 3/4	93 3/4	93 3/4	93 3/4
Corn																
Chicago	93 1/2	75	79 3/4	78 3/4	79 1/2	77 3/4	76 3/4	77 3/4	78 3/4	78	78 3/4	77 3/4	77 3/4	77 3/4	77 3/4	77 3/4
Kansas City	95 1/2	75	81 3/4	80 3/4	80 3/4	79 3/4	78 3/4	79	81	80 3/4	80 3/4	80 3/4	80 3/4	79 3/4	80 3/4	80 3/4
Milwaukee	93 3/4	75 1/2	79 3/4	78 3/4	79	77 3/4	76 3/4	77 3/4	78 3/4	77 3/4	78 3/4	77 3/4	77 3/4	77 3/4	77 3/4	77 3/4
Oats																
Chicago	59 1/4	41 1/2	47 1/4	46 1/2	46 1/4	43 3/4	42 3/4	42 3/4	43 3/4	43 3/4	44 1/4	43 3/4	43 3/4	43 3/4	43 3/4	43 3/4
Winnipeg	49 3/4	35	40	39 3/4	38 3/4	38	36 3/4	37 3/4	38 3/4	38 3/4	38 3/4	38 3/4	38 3/4	38 3/4	38 3/4	39
Minneapolis	55 3/4	42 1/4	47 3/4	46 3/4	46 3/4	44 3/4	43	43 3/4	44 3/4	44 3/4	44 3/4	44 3/4	44 3/4	44 3/4	44 3/4	44
Milwaukee	58 3/4	41 1/2	47 1/4	46 3/4	46 3/4	44	42 3/4	43 3/4	43 3/4	43 3/4	44 3/4	44 3/4	44 3/4	44 3/4	44 3/4	44
Rye																
Chicago	95 3/4	53	59 1/2	57 3/4	57 3/4	56 1/4	53 3/4	54 1/4	55 1/4	55 1/4	56	55 1/4	55 1/4	55 1/4	55 1/4	55 1/4
Minneapolis	84 1/4	53 1/4	59 1/2	57 3/4	56 3/4	56 1/4	54	54 1/4	56	56 1/4	56 3/4	56 3/4	56 3/4	55 3/4	55 3/4	55 3/4
Winnipeg	80 1/4	45 3/4	51 3/4	50 1/4	49 1/4	48 3/4	46 3/4	47 1/4	48 3/4	48 3/4	49 3/4	49 3/4	49 3/4	49 3/4	49 3/4	49 3/4
Duluth	79 1/4	54 1/2	59	58	57	56 1/2	55	54 1/2	55 1/2	56 1/4	57	56	56	56	56	56
Barley																
Minneapolis	82	55	62 1/4	59 1/4	58 3/4	57 3/4	56 3/4	57	58 3/4	58 3/4	59	57 3/4	57 3/4	57 3/4	58 3/4	58 3/4
Winnipeg	65 3/4	42	47	45 3/4	45 1/4	44 1/4	42 3/4	43 3/4	45 3/4	45 3/4	46	45 3/4	44 3/4	44 3/4	45 3/4	45 3/4
Milwaukee	86 1/4	61 1/2	67	65	64	64	62	62	63 3/4	63 3/4	63 3/4	63 3/4	63 3/4	63 3/4	63 3/4	63 3/4
Chicago	86	61 1/2	67	65	64	64	62	62	63 3/4	63 3/4	63 3/4	63 3/4	63 3/4	63 3/4	63 3/4	63 3/4

*At daily current rate of exchange.

Grain Movement

Reports on the movement of grain from farm to country elevator and movement from interior points are always welcome.

Storm Lake, Ia., Mar. 19.—A trucker from Nebraska paid 76 cents for corn from the Storm Lake territory this morning.—Art Torkelson, with Lamson Bros. & Co.

Marcus, Ia., Mar. 19.—An elevator here offered a farmer 75 cents for new No. 3 yellow corn today, and is not getting any, and Chicago May closed 76½/8 tonight.—Art Torkelson.

Boston, Mass.—Shortage of good grades of wheat at Norfolk, Va., and Wilmington, Del., was responsible for a large order coming to the Boston trade. The steamer Mayan loaded 84,000 bus. of Californian wheat at Boston elevators, for the southern ports. Grain dealers say this is the only shipment that will go from Boston, as the supply here is insufficient to allow more sales.—L. V. S.

Vancouver, B. C.—February receipts of grain were: Wheat 4,377,001 bus., oats 566,826, barley 181,679, flaxseed 179, rye 392, against wheat 3,548,036 bus., oats 435,475, barley 55,351, flaxseed 262, rye 1,564, in February, 1934. Shipments during the same period were: Wheat 3,692,777 bus., oats 572,175, barley 120,940, against wheat 5,081,589 bus., oats 365,984, barley 122,341, in February, 1934.—E. A. Ursell, statistician, Board of Grain Commissioners for Canada.

Decatur, Ill., Mar. 28.—Very little corn is offered by the country. Truckers are very active again hauling corn to the Southwest. Corn industries report a very slow demand for their products. Their grind has been very light the past few months. The Department of Agriculture reports that farmers in Illinois intend to plant 1,682,000 acres of soybeans this year. Acreage harvested in 1934 was 1,193,000; 1933, 568,000. This increase in acreage is due to good demand for the beans produced last year, drouth conditions and to the lifting of contract restrictions on acreage of feed crops.—Baldwin Elevator Co.

Canadian Grain Movement

Ottawa, Ont., Mar. 22.—Canadian wheat in store for the week ending Mar. 15 shows a decrease of 1,681,803 bus., as compared with the previous week and an increase of 12,690,320 bus., when compared with the like week in 1934. The visible supply was reported as 237,723,636 bus., as compared with a revised figure of 239,405,439 bus. for the preceding week and 225,933,316 bus. for the corresponding week in 1934.

Canadian wheat in the United States amounted to 19,756,771 bus., a decrease of 803,917 bus. from the preceding week when 20,560,688 bus. were reported. The Canadian wheat in store in the United States is located at the following ports: Buffalo, 10,955,877; New York, 454,221; Erie, 1,604,000; Albany, 4,636,000; Duluth, 1,571,673; Chicago, 333,000, and New Orleans, 202,000 bus. Decreases are shown in all the United States ports except Albany which shows an increase 479,000 bus. over the previous week. The largest decreases took place in Buffalo, Chicago, New York and Erie. For the corresponding week a year ago, the wheat stocks amounted to 7,840,846 bus. located as follows: Buffalo, 2,604,167; New York, 1,816,265; Albany, 2,777,000; Boston, 380,560; Philadelphia, 221,000; Newport News, 39,000, and Duluth, 2,854 bus.

United States wheat in Canada was shown as 1,048,912 bus., as compared with 2,228,643 bus. a year ago.

Wheat marketings in the Prairie Provinces for the week ending Mar. 8 amounted to 1,166,521 bus., a decrease of 718,168 bus. from the previous week when 2,384,689 bus. were marketed. During the corresponding period a year ago the receipts were 2,226,768 bus. For the thirty-two weeks ending March 8, 1935, and

March 9, 1934, 188,771,340 bus. and 182,449,838 bus., respectively, were received from the farms. This is an increase of 6,321,502 bus. over the same period a year ago. By provinces the receipts for the week ending Mar. 8, 1935, were as follows, figures within brackets being those for the week ending Mar. 9, 1934: Manitoba 130,998 (184,438); Saskatchewan, 598,909 (979,182); Alberta, 936,614 (1,063,148) bus.

Marketings of wheat in the three Prairie Provinces to March 8, 1935, as compared with the same period in 1934 were as follows, figures within brackets being those for 1934: Manitoba, 27,632,628 (24,134,588); Saskatchewan, 82,963,916 (90,050,931); Alberta, 78,174,796 (68,264,319) bus.—R. H. Coats, Dominion Statistician.

The Wheat Farmer and the Grain Trade

From address by GEORGE E. FARRELL, Director, Division of Grains, A. A. A., before Grain Market Analysts Club, Chicago.

Approximately 800,000 wheat producers have signed the 577,000 contracts which placed under contract approximately 78% of the acreage planted in 1930-32.

The working out of the wheat program has been a powerful stimulus to thinking on the part of the farmers. As never before they are thinking in terms of world supply and demand, in terms of our export trade, in terms of land policy, and the future of wheat farming.

While some industries prospered on ridiculously low farm prices, agriculture was going behind. A primary reason for this was the inability of agriculture to get a sufficient share of the national income to enable it to retain a balance with the other component parts of our economic machine. Measured by any scale, by total farm income, percentage of national income, by the increasing farm debt load, by seed loans, by relief, or by the barometer of social unrest, the answer was the same. Agriculture was losing ground in relation to industry.

Within a few months winter wheat farmers will begin seeding for the 1936 crop. A new problem faces us.

In Washington we have been considering for some time just what type of wheat adjustment should be undertaken after 1935. However, we are dealing with a complex problem and I am unable to say more at this time than that our considerations to date point toward a policy which will permit us to take advantage of every single export possibility, but which will not place us in the position of building up surpluses for which there is no market and no profit.

Altho the method by which we attack the problem may vary from time to time, the fundamental policy of the Agricultural Adjustment Administration remains the same.

Policy of A. A. A.—That policy is to give the farmer's dollar a purchasing power equal to that of the pre-war period. In other words, to provide the means whereby agriculture can get that share of the national income which it must have in order to retain its proper place in the national economic picture. The method used to approach that goal in wheat, cotton and other major commodities is now a familiar one. That is the method of the processing tax, adjusted to the farm price level. This method has proved effective in bringing the return to farmers on the domestically consumed proportion of their crops to approximately the parity level. It has had another result, demonstrated in a striking fashion by the drouth.

This result is the crop-income insurance feature which meant so much to so many Great Plains farmers last year when the drouth wiped out or sharply reduced their harvests. The allotment plan provides that if a farmer plants his acreage in the usual manner, and in conformance with the wheat allotment contract, he is entitled to the adjustment payment on his allotment, which is his proportionate share of the annual consumption of wheat in the country. This payment is not determined by the amount of crop harvested from the acreage planted, but is based on a farmer's past production. This "share the risk" plan is, in effect, social insurance for large numbers of our farmers, especially in the western plains areas.

Our best estimates show that average yields from approximately 50 million acres, in years of normal weather, will furnish all the wheat that we can consume in the United States, as well as provide for seed, and some livestock feeding. That means that the crop on any more than 50 million acres must be exported or must back up in our own granaries. The amount of wheat we can export is problematical.

If we can export between 75 and 100 million

bus. we will have done exceedingly well. From 6 to 8 million acres will normally grow this much wheat. Adding this acreage to that needed for our domestic consumption, we find that from 56 to 58 million acres of wheat is about all we should be growing for the next few years. In the 1930-32 base period of the wheat plan, seedings averaged about 66 million acres.

For 1934, the first year in which acreage reduction was in effect under the A. A. A. program, seedings were about 60 million acres. With the increased acreage which has been authorized for 1935, seedings may be somewhat above the 1934 figures, as the authorized increase totalled about 2½ million acres. With average yields this acreage can soon pile up another wheat surplus. That is one of the biggest problems we have to consider in making our plans for the future.

We could reduce our production to a domestic basis, and the law of supply and demand would boost prices to near the parity level, but there wouldn't be so much wheat to sell, nor to handle, and total income to farmers would undoubtedly be less than under greater production.

If all restrictions were lifted and farmers grew all they could, prices would be more likely to sink toward depression levels, the processing tax would have to be materially increased in order for farmers to receive parity on their domestic allotments, and consumers would justly complain that they were being taxed unduly for the sake of export trade and the sake of volume for domestic handlers.

There is, however, a middle ground, in which we might raise enough wheat for our domestic requirements, have a moderate amount to export, and give farmers parity with only a moderate processing tax. This would allow price levels in line with world prices, and allow a reasonable volume of business to handlers and distributors.

This is not a preview of the 1936 wheat program, but merely indicates some of the complexities.

Instead of hearing the grain trade demand more exports, farmers would rather see the influence of the grain trade put behind the fundamental problem in our international trade, that of increasing import trade to the volume which it must have if we are to continue to export. They wish the grain trade would study the import problem as well as the export problem. They would like to see the grain trade get behind the reciprocal trade program and support those judicious adjustments in our commercial policy which would enable us to import commodities in which other countries have a comparative advantage in production. The American wheat farmer doesn't object to railroads, terminal elevators, millers, and bakers making money, provided he is getting his share.

Thos. Y. Wickham, grain merchant and member of the Chicago Board of Trade, is one of a delegation of United States business men selected by the National Foreign Trade Council to promote trade in the Far East, by means of governmental trade agreements. The party left Mar. 25 from San Francisco for China and Japan. Mr. Wickham represents the Millers National Federation and the North Pacific Millers Ass'n and a meat packing concern.

Books Received

INTERNATIONAL YEARBOOK of Agricultural Statistics for 1933-34 contains in both English and French detailed tabulated statistics of the crops of all nations reporting to the International Institute of Agriculture, areas, population, exports, imports, prices, exchange. Paper, 818 pages, International Institute of Agriculture, Villa Umberto I, Rome, Italy.

WHEAT FUTURES Annual Volume in Relation to Supplies is the first exhaustive study of the variations in the volume of future trading on the Chicago Board of Trade as compared with the stocks of wheat. The character of the Chicago pit as the international market is demonstrated by the close relationship shown between the annual volume of trading and the world supplies of wheat by crop years, from 1922-23 to 1933-34, and particularly combined production and carry-over of wheat in the United States and Canada. Multigraphed, 8 pages, by Paul Mehl, senior agricultural economist. Copies obtainable on application to the Grain Futures Administration, U. S. Dept. of Agriculture, Washington, D. C.

Elevator Innovations Earn Profitable Returns

Unhampered by precedent several young firms entering the grain, feed and seed business near the beginning of the depression period have won marked success. Two things these growing enterprises have in common. One is the cash basis for doing business; the other, and perhaps the most important, is an insatiable desire for new ideas that can be utilized in producing merchandising profits.

Syler & Syler, Plymouth, Ind., wholesale and retail grain, feed, seeds, and coal, is decidedly a young firm, tho it is an old family partnership name. The Plymouth project began in July, 1930, with the purchase of the Plymouth elevator by Ivan W. Syler, the fourth generation of Sylers to enter the grain business. Maurice D. Campbell early became an associate with an interest in the business, and shares with Mr. Syler the credit for development of the enterprise.

Plymouth, the county seat of Marshall county, is the trading center for a general farming community, raising grains, seeds, livestock and poultry. Mr. Syler early concluded that so diversified a community must be served with a diversified business, and worked as vigorously at developing the seed, feed and coal departments as he did at buying grain.

The Syler & Syler elevator is an 18,000 bu. structure on the Nickel Plate railroad. Grain is elevated to and from its seven large storage bins with two legs, each carrying 13x7 inch buckets on 18 inch centers. In the driveway are two dump sinks, one of which is fitted with an ear corn drag to serve the sheller ahead of the boot of one leg.

Some feed grains must be shipped to Plymouth to supply feeder demand. For this purpose the elevator was fitted with a receiving chute and spouting for unloading carlots of feed grains.

Most of the feed grinding, and seed cleaning machinery, all operated by electricity, are located in the basement and on the work floor of the elevator.

FEED: Feed grinding and mixing equipment includes a Duplex corn cracker and grader, an Ace hammer mill with direct-connected 60 h.p. Fairbanks-Morse motor, a molasses mixer, a one-ton feed mixer, and a portable bag sewing machine for stitching shut the tops of sacks of feeds and seeds of the company's own packing.

The company manufactures Sterling Brand feeds. It also does custom grinding and mixing for the local trade. A common practice in feed grinding was to measure all the ingredients in an ordered formula together on the floor above the garner to the hammer mill, shovel them over and run them thru the mill together.

One farmer noticed that folks walked across the space where this shoveling was done, and suggested that a box be made in which the ingredients could be measured. "The reason," he explained, "is that some farmers who walk across that shovel mixing floor might have coccidiosis in their chicken runs and bring some of the germs along on their boots. Shovel mixing the feed grains where they walk might cause the infection to be carried to the flocks of other farmers."

Syler & Syler promptly built an ingredient measuring box on wheels so it could easily be pushed on and off a platform scale, a hopper bottom to be provided with a gate thru which the contents of the box could be dropped into the garner above the hammer mill. This device quickly won the approval of the farmers.

SEED: Farmers of the Plymouth territory raise large quantities of red clover seed. Principally for its own protection in purchasing stocks of seeds the firm installed a small seed laboratory in one corner of its office and hired Seed Analyst Harry Cripe, Purdue University graduate. The laboratory equipment includes samplers, testers, balance scales, a Minnesota

germinator and other fittings for analyzing and testing seeds.

The trade soon learned of the laboratory and demanded that its services be made available for purity and germination tests on seeds at customary rates, a demand with which Syler & Syler were pleased to comply.

An innovation growing out of the purchase of small lots of field seeds from many sources is a 1,000 bu. seed bulking bin built in the elevator. This is a fairly shallow bin, with six hoppers outlets in its bottom set at three levels one above the other. Spouts from the six hopper bottoms deliver seeds from the bin to a common hopper above one of the two standard cleaners on the work floor. Seed is simultaneously drawn from three levels of the bin. This process merges the six streams into a fair average of the entire contents of the bin, tho there might be wide variation in the lots when dumped into the bin.

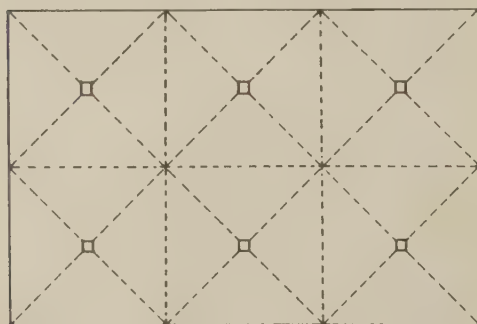
A demand for mixed cars of seeds caused the firm to win transit privileges. These privileges permit shipping in carloads of alfalfa and other field seeds from the west and northwest, breaking them into mixed cars to include lots of locally produced red clover seed for shipment east and south. When a demand for soybean seed came from the west Syler & Syler obtained transit privileges in the opposite direction so that they could handle this commodity more efficiently.

Buckhorn is a real problem in the local red clover seed. This led to the installation of a gravity seed separator, with buckhorn unit, in a separate room on the second floor of the elevator. The company uses this for custom cleaning as well as its own seed cleaning operations mentioned in its advertising:

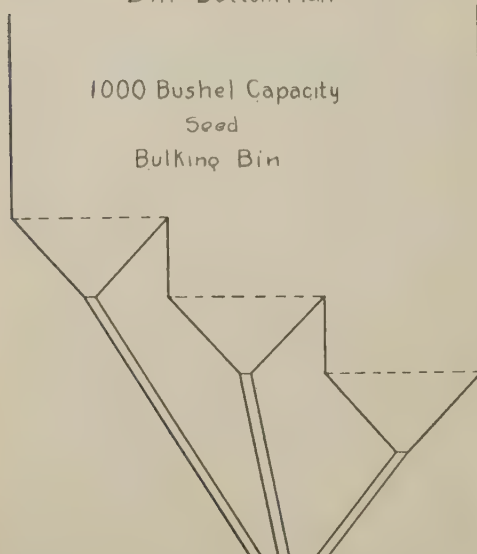
We guarantee to clean any lot of seed carrying a fair purity, so that you may show a clean tag as far as Buckhorn is concerned. If we are unable to do this, your cleaning will cost you nothing. The process is slow and we recommend that you make arrangements with us before bringing your seed. Rates are as follows: 3 to 10 bus., \$1 per bu.; 11 to 20 bus., 75c per bu.; 21 bus. or more, 50c per bu. It is impossible to handle smaller lots than 3 bus.

For convenience in reaching the second floor of the elevator a one-half ton, hand operated elevator is used. This is at one end of the 70 ft. long warehouse space on the first floor, and 40 ft. long space on the second floor where feed ingredients, seeds and other wholesale and retail stocks are kept.

WAREHOUSE EXPANSION: When expansion of the business of Syler & Syler created need for additional warehouse space another unit was built adjoining the old. The new feed warehouse is a 40x68 ft. frame, iron-clad



Bin Bottom Plan



Spouts to Cleaner or Sacker

Syler & Syler's Seed Bulking Bin.



Syler & Syler's Plant at Plymouth, Ind.
[See facing page.]

structure 12 ft. high from the floor to the eaves, 15 ft. to the ridge. A double door connects this warehouse with the space in the elevator.

Below the new warehouse the foundation walls break the cinder floored basement into three rooms, each 68 ft. long. These are reached thru ramps and double doors at the back end of the warehouse shown in illustration.

A 16 ft. space at the end of one of these rooms has been floored, and wired off with a fine mesh screen to make it mouse and rat proof. In this is kept costly stock that is subject to rodent damage. The remainder of the space in this room is fitted with shelving.

The second room is supplied with wood flooring, built in sections so it can be lifted on edge and leaned against the wall of the room. Two sections span the width of the room. The floor for the entire room can be quickly dropped to keep merchandise off the cinders, and it is little more of a job to lift the sections against the wall so that trucks can be driven into the room.

The third room is used only for storage of the firm's three Chevrolet 1½ ton trucks. At one end is a furnace, which keeps the air warm enough so the trucks may be easily started in cold weather. Around one side and one end of the new warehouse is a dock for convenient loading or unloading of trucks.

COAL: While there are several coal dealers in the city, the coal department of Syler & Syler has grown until additional coal yard space had to be leased.

Coal is a short profit commodity that must be handled economically. A device developed for this purpose is an unloading hopper between the rails of the switch track. The throat of this hopper is closed with a hand operated, un-

dercut gate. Shipments of coal are ordered only in hopper cars.

A ramp leads from the coal yard, down thru a coal bin and under the gate of the track hopper. Trucks are backed down this incline under the hopper and filled direct from the car by hand operation of the hopper gate, without any shoveling.

The ramp and pit are heavily walled with reinforced concrete, and the railroad tracks above the pit are supported by heavy I beams.

The coal unloading hopper sharply reduces labor and handling costs in merchandising coal. The firm also uses it in unloading limestone. Usually agricultural limestone is sold ahead and delivery so arranged that the farmers haul the limestone direct from the unloading hopper to the fields. The unloading hopper is made available to other coal dealers in Plymouth at 10c per ton when it is not being used by its owners.

Syler & Syler do an extensive business thru northern Indiana and southern Michigan. Truck lots of feed ingredients and seeds are wholesaled to elevators, feed stores and other outlets. The offerings of the firm are kept before this trade with regular direct-by-mail circulars. Coal is a strictly local business and regular space is carried in the local newspaper to remind customers and prospective customers that Syler & Syler want to supply them with fuel.

Geo. S. Milnor, former vice pres. and gen. manager of the Farmers National Grain Corporation, is said to be planning to engage in financing of grain and milling industries.

Domestic maltsters fear a reduction in the duty on malt from Canada in the present negotiation of a reciprocal trade treaty between the United States and the Dominion.

Prolonging Life of Conveyor Belts

By W. W. SAYERS of Link Belt Co.

The belt is the most expensive part of a belt conveyor; therefore, it should be protected from unnecessary wear and injury.

If a belt is allowed to run improperly trained, its life will be greatly shortened and even the highest grade belt will be a disappointment. Conveyor belts, whether empty or centrally loaded, usually run true for long periods after once being properly trained.

When a belt runs out of line, the cause should be found and corrected at once. Belts should always run true and central on the carrying and return idlers, either loaded or empty. Otherwise, the belt edges will wear off against frames or other obstructions, and the bottom of the belt is liable to injury by riding on the edges of troughing idlers; furthermore, the grain may spill.

If one section of a conveyor belt runs true and central on the idlers, and another section runs out of line along all parts of its travel, it indicates that the belt is either crooked or not centrally loaded. If the part that runs out is at the splice, it is probable that the splice or joint is not square.

On the other hand, if the belt runs out steadily at any one point in the conveyor, that is, if it keeps running out on the same idlers, it is the idlers that are out of line. Usually the idler or idlers causing the trouble is or are just behind the point where the belt starts out of line.

Conveyor belts should be trained while empty, and if they run out of line when loaded, it is probably due to uncentral or side loading. Correction of the loading spout is the preferable remedy.

Variations in the volume, sizes or moisture content, of materials fed to belt at different times may make it impossible to keep the loaded belt in alignment by means of either the supporting idlers or alterations to the loading spout. When varying material causes the belt to be loaded more heavily on one side of its centerline, the heavily loaded side seeks a lower level, thereby crowding the belt off-center with the idlers. Pivoted self-aligning idlers should be used for correcting the effects of such varying conditions.

Belts cannot be made to run true by adjustment of takeup screws, or of head pulley. Both head and tail pulleys should be set in alignment, and kept so. All other training should be done by the idlers, or if possible, by correction of the loading chute.

The center roll of a troughing idler must be in contact with the belt, for it is the one that really steers or trains the belt, unless the belt is over-plied or too stiff to assume the shape of the idlers when empty, and thus fails to make contact with the center roll.

Idlers should be kept square with the belt, and when training belt by lining up idlers, always work with direction of belt travel. Stuck or sluggish idler rolls always tend to deflect the belt and cause it to wear unnecessarily.

Foundations or conveyor supports may be responsible for bad alignment of belts, if not secure and rigid.

Side guide idlers or self-aligning idlers should never be used while training a belt. Guide idlers bearing against the edge of a belt are frequently the cause of excessive wear and premature failure of the belt. They destroy and loosen up the edges, permitting the entrance of moisture and dirt between the plies of the fabric.

It is a mistake to try to train a belt by increasing the tension. This not only strains the driving mechanism, but increases the horse power requirements, puts an unnecessary stress on the belt, weakens the splice, reduces the troughing of the belt, and thus prevents the effective training action of the center idler roll.

Trippers should be inspected regularly, to see that belts do not scrape against the frame, and

Syler & Syler's Coal Receiving Dump



Above: Sink for receiving coal from hopper bottom cars.
Below: Under cut gate for dropping contents of hopper into truck.
[See facing page.]

Collecting Slow Accounts

that the belt runs true over the pulleys of the tripper.

Skirt boards should be set so that they are close to the belt but not touching it. Short skirt boards at loading points should be set, or cut away, in such a manner that the space between the belt and the skirt board increases in the direction of the belt travel. Thus pieces of material which would otherwise wedge in between the belt and skirt board, are permitted to work free, instead of gouging the cover of the belt, or pushing the belt to one side.

Self-aligning idlers, above referred to, resemble stationary idlers, except that they are pivotally mounted and swivel automatically when the belt is misaligned, thereby leading the belt and maintaining it central with the supporting idlers.

Self-aligning idlers actually correct misalignment without harming the belt, whereas fixed guide rolls at sides of belt do not overcome misalignment, but merely restrain forcibly any further sideways movement of the belt. As long as misalignment occurs there is a continuous heavy pressure between the belt edge and the fixed guide roll. This action wears and destroys the belt edge rapidly.

Power Plants Need Improvement

There are potent possibilities in the realm of improving the grain elevators we have, and that applies particularly to power. Insufficient thought or study has been given that phase of grain elevator operations, and in most cases the obvious course of hooking up to a power company's lines has been followed. The load factor of a grain elevator is probably the worst in the experience of utility companies, and of course the grain elevator is penalized on that account.—D. B. Fegles, pres. Fegles Construction Co.

Donald R. Richberg of Chicago on Mar. 21 was appointed acting chairman of the N.R.A., to replace S. Clay Williams, tobacco manufacturer. At the same time the board was increased to nine by adding Wm. P. Withers, industrialist of Pittsburgh, and Philip Murray, vice pres. of the United Mine Workers.

A Modern Concrete Country Elevator

A group of four 17-ft. tanks 100 feet high forms the up-to-date steel-reinforced elevator recently completed at Greensburg, Kan., for the Farmers Grain & Supply Co.

The arrangement of the tanks is such as to provide for 8 bins over the work room, making a total of 12 bins with 80,000 bus. storage capacity, of which the four large bins hold each 16,000 bus., and the overhead bins 900 to 4,500 bus. each. All bins have hopper bottoms and gravity feed to boot. The building is 116 ft. high from ground to top of cupola, a tall climb that is avoided by using the Ehrsam Manlift.

The attached driveway contains an improved Truck Lift of the latest type, a steel grate and pan 6x8 ft., and an air-compressor of the 2-stage type driven automatically by a 3-h.p. totally enclosed Fairbanks-Morse Motor.

The equipment includes one stand of elevators of 4,000 bus. capacity with 12-in., 6-ply rubber belt, and 11x7 V buckets. The leg is driven by a 25-h.p. totally enclosed Fairbanks-Morse Motor thru a Fairbanks-Falk Gear Unit. A 10-bu. Richardson Automatic Scale weighs the outgoing grain. All spouting is of steel and was supplied by the J. B. Ehrsam & Sons Mfg. Co., as was the sheet metal.

The fire hazard has been reduced by placing all wiring in rigid conduit. Lamps are of the dust-proof type. The elevator was designed and built by Chalmers & Borton.

Manager W. H. Ruth handles side lines such as coal, bran, shorts, cotton cake, stock salt, oyster shell, corn chop, alfalfa and prairie hay. A feed mill does custom grinding.

When R. E. Crone, feed salesman and traveling man, took charge of the Osborn Cooperative Grain Co., Osborn, O., in June, 1934, he found \$13 capital on which to do business, a number of supposedly uncollectible farmers' accounts, bills payable exceeding \$600, a heavy indebtedness at the bank and two employees who were working turn about every other day.

"Are we to continue to work every other day?" the two employees wanted to know.

Tall, dark-haired, energetic Mr. Crone rolled up his shirt-sleeves, and adjusted his glasses. "You can't run a business successfully unless you are on the job every day," he answered. "We are starting literally from scratch, maybe a little worse. From this point on it is up to us to make our jobs. Both of you will have to work every day."

The banker was loath to sink more money in an enterprise that already owed him so much, so he thought "if you get real hard pinched we might be able to help you over a tough spot." Mr. Crone did not think it would be necessary. As rapidly as carloads of wheat were accumulated he sold and drew drafts. By the time the farmers had hauled in their crops and called for their money he had it ready for them. Not a single man had to wait for his check. There were two exceptions.

Mr. Crone had re-arranged and improved the accounts receivable records, putting live and hopeful accounts in one book, dead accounts in another, so that he could conduct a systematic campaign at collecting money due the elevator.

One farmer who brought in wheat owed the elevator over \$300; another owed approximately \$600. When these farmers came for their wheat money, Mr. Crone called attention to the sad state of their accounts.

In each case the farmer contended he needed the money and could not pay the account. "No one," declared Mr. Crone, "needs money more than this elevator."

"But that wheat is mortgaged. I must have the money to pay the mortgage," swore one farmer.

"All the more reason why we should hold the money," replied Mr. Crone, unperturbed. "The mortgagor is apt to demand second payment

from us." Then he went over to the court house, where he learned that the so-called mortgage against the wheat was over two years old and could not possibly have applied on the current crop.

The two debtors appealed to Mr. Crone's directors. The directors called a meeting. "Those farmers," they told him, "are in desperate financial circumstances. They need their money, and you ought to let them have it."

Mr. Crone reiterated, "No one needs money more than this elevator, with its \$13 working capital and \$600 in bills payable. You hired me because you felt that a local man would find it difficult to enforce collections. If you do not want these bills collected and your business rebuilt on a sound foundation you do not want me as your manager."

Finally the directors decided the bills needed to be collected.

One farmer had a little money left after the payment of his account and was given his due. The other farmer didn't have sufficient wheat to cover his bill. He proved that he had to have some money to avoid bankruptcy. So an arrangement was worked out whereby he settled over one-third of his bill, and gave the company a new note for the balance. Today, Mr. Crone reports, both farmers are good customers of the company, and they pay cash for their purchases.

Mr. Crone is firmly convinced that a paid bill makes a good customer. An example he tells about, reflecting one of his collection methods, is a personal note written on the bottom of a monthly statement. This calls attention to the age of the account and adds: "If this bill is not paid by [a specified date] we shall be forced to take action."

A townsman with a backyard full of chickens had done no business with the elevator in over two years. His unpaid bill amounted to \$2.35. Mr. Crone added his warning to the poultry man's bill. Soon the townsman came in. "I can't," he explained, "make payment by the date you specify. But I can and will a few days later."

It was four days past the date of payment the townsman agreed upon before he came in to make settlement. On receiving his receipt he said: "Say! What kind of coal do you handle? I've got to buy some coal pretty soon."

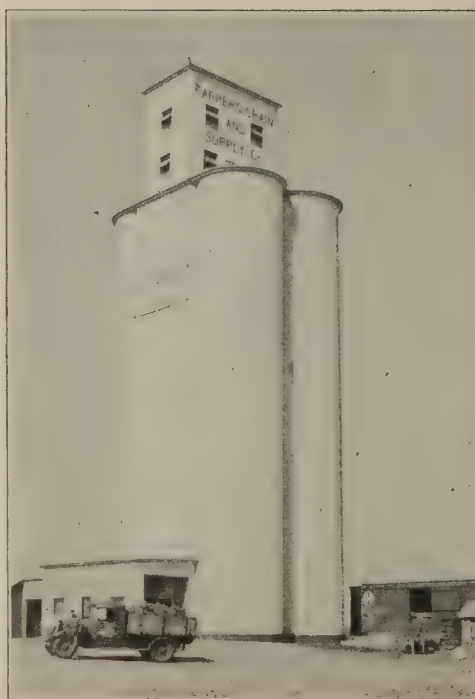
Mr. Crone collected over \$1,000 from the accounts due the elevator, with which he created working capital. That problem settled he did some re-arranging of the elevator equipment so that he could improve service to the customers. With \$1,500 of accumulated funds he remodeled and tripled the size of the office to accommodate an attractive display of merchandise. A cash register was added to the office equipment. In the elevator he installed a Sidney vertical feed mixer, and an ear corn crusher. A new Chevrolet 1½ ton truck was added to the company's delivery equipment.

When the fertilizer season arrived Mr. Crone vigorously worked in the field, selling this sideline to the farmers of the community and succeeded in moving 70 tons in seven months. This compared with 18 tons in the preceding 12 months.

January 31 was inventory time. The new audit showed that from a start of many bad debts and \$13 in the bank, seven and one-half months under Mr. Crone's management had given the company a \$1,600 increase in inventory, \$48,000 gross business and \$3,700 profit.

Lending working capital to sluggards will soon strangle any business.

Code authorities are exempt from federal income tax under a ruling of the commissioner of internal revenue.



80,000 bu. Elevator at Greensburg, Kan.

Grain and Feed Trade News

Reports of new firms, changes, deaths and failures; new elevators, feed mills, improvements, fires, casualties and accidents are solicited.

ARKANSAS

Ashdown, Ark.—The Freeman Grain Co. is now buying farmers' surplus stock of cream, poultry and eggs, for which it pays the highest market prices.

CALIFORNIA

Sacramento, Cal.—Com'ites of both the house and senate have approved a bill pending in the State Legislature limiting the length of trains, both passenger and freight.

CANADA

Ft. William, Ont.—Frederick Woodman, chief accountant at the Western Terminal Elvtr. here for the past 25 years, previous to which he was employed by the Consolidated Elvtr. Co. for a short time, died Mar. 14, at the age of 61 years.

Ottawa, Ont.—In accordance with an amendment to the Canada Grain Act passed at the last session of Parliament, separate grading of garnet wheat will be effective this year, Aug. 1, when it will be graded as No. 1 and No. 2 garnet wheat, grades inferior to No. 2 being classed as No. 3 northern and the lower grades of Manitobas. No. 1 hard, No. 1 northern and No. 2 northern will contain only wheat that is Marquis or its equivalent, as defined in the Canada Grain Act.

COLORADO

Denver, Colo.—Colorado lawmakers have just passed a bill which limits the length of passenger and freight trains.

Denver, Colo.—A sales tax was rushed thru the Colorado Legislature as an emergency measure to raise funds for relief, on Mar. 1. The state treas. later gave out an interpretation (in answer to a request from the Colorado Seedsmen's Ass'n) of the law, in which he said: "With reference to the interpretation of the sales tax law as it applies to seeds, fertilizers and insecticides, it is our opinion that all of such items are exempt from the tax." All seed dealers are required to secure a signed affidavit from all purchasers of seed for resale or for processing unless the 2% sales tax is paid. Forms are provided for this purpose.

ILLINOIS

New Baden, Ill.—Wind damaged a section of the mill roof of the New Baden Milling Co. on Mar. 6.

Bunker Hill, Ill.—Val E. Schmitt has been appointed manager of the Bunker Hill Grain Co.'s elevator and is moving his family to this point.

Bushnell, Ill.—The grain elevator here formerly owned and operated by A. B. Curtis, deceased, has been purchased at public auction by James Spiker.

Athens, Ill.—The Athens Farmers Elvtr. Co., Emery Jensen, manager, has become a member of the Illinois Grain Corp., the Illinois setup of the Farmers National Grain Corp.

East St. Louis, Ill.—The Sinn-Cro Mills, incorporated; capital stock, 100 shares p. v. common; incorporators: Martin Mullally, Joe Hirsch and Mrs. Mary Flynn; to manufacture and distribute grain and feed ingredients.

Decatur, Ill.—Mrs. Mildred H. Kapp, wife of Horace J. Kapp, manager of the grain department of the Staley Co., died in the Decatur and Macon County Hospital Mar. 6, after an illness of only a few days. She underwent an operation the day before.

Arcola, Ill.—Clarence Coombe, owner and manager of the Arcola Grain & Coal Co., has sold his elevators at this point and at Chester-ville to the Evans Elvtr. Co., of Decatur, Ill. Mr. Coombe plans to devote his time to the management of his farms.

Ashkum, Ill.—Contract for the construction of a new 40,000-bu. frame, iron-clad elevator for the Ford-Stout Grain Co. has been awarded to George Saathoff, replacing the elevator burned early in February, as previously reported. The new house, which will be 32x40 feet, 52 feet high, will be equipped with up-to-date machinery.

Havana, Ill.—Five grain elevators belonging to G. C. McFadden and located at this point, Topeka, Chandlerville, Biggs and Easton were sold, on Mar. 16, at a trustee sale, the purchasers being representatives of the Continental Grain Co., of St. Louis, Mo. The amount paid was \$26,750, after a \$3,500 mortgage was taken care of. These elevators have been leased to the Continental Co. for several months and are managed by Fred Lyons and sons, of Havana.

Leonard (Gilman p. o.), Ill.—The Danforth Farmers Elvtr. Co., of Danforth, Ill., which last January purchased the properties of the Leonard Farmers Co-op. Co. (as reported in the Jan. 23 Journals), subject to the 15 months' lease of L. M. Walker, of Gilman, has assumed the Walker lease and took charge Mar. 1. Charles Dykstra, who has been employed at the Danforth plant for the past several years, will occupy the manager's residence and be in charge of the plant.

CHICAGO NOTES

Board of Trade memberships are selling at \$4,500 net to the buyer.

Walter R. Batsell, a member of the Board of Trade, died Mar. 12.

Jesse Livermore has applied for reinstatement to membership in the Board of Trade.

The rate of interest during April for advances on Bs/L has been set by the directors of the Board of Trade at 5% per annum.

A well attended session of the Grain Market Analysts Club listened to the address by Geo. E. Farrell, chief of the grain division of the A.A.A., on the evening of Mar. 18, which appears elsewhere.

The special com'ite appointed to study the application of future trading to soybeans has reported the proposal not feasible at present, with a recommendation that preliminary work toward the creation of a future market be carried on. Interior buyers from growers have no way to hedge except by contracting with an oil miller.

New members of the Board of Trade include the following: Samuel M. Gordon, Etienne de Crozals, William P. Ronan, J. Cowan Adam, Malon C. Courts, Daniel J. Hogan and Frederick Nussbaum. Memberships transferred: Walter W. Price, Estate of C. De Peyster Berry, John G. Roberts, Lloyd E. Beach, Walter Glass, Arthur R. Stone. Change in registration of members: William Enke, Jr., registered as ass't sec'y, John Kellogg Co., Chicago; Almar H. Shattford (New York), registered for own account (was registered for John F. Clark & Co.). Retired from partnership: Slaughter & Russell—Dean Dillman, Eric L. Pedley, Henry P. Russell, Walter G. Van Pelt, Kenneth Walsh.

A petition, asking for a reduction in the present minimum margin requirement of 10% on speculative trades in grain futures, is being prepared by floor brokers on the Chicago Board of Trade to be presented to George H. Davis, of Kansas City, chairman of the national grain exchange code authority. The volume of grain futures trading is being restricted by the present code minimum, the brokers state.

INDIANA

Garrett, Ind.—Oscar F. Stump Grain & Coal Co. has installed a hammer mill and 30-h.p. motor.

Inwood, Ind.—Aluminum paint has been purchased to paint the elevator of the Inwood Elvtr. Co. this spring.

Rolling Prairie, Ind.—Rolling Prairie Lbr. & Grain Co. is remodeling its elevator, installing several new electric motors.

Geneva, Ind.—Installation of a corn cracker and grader is contemplated by the Geneva Equity Exchange.—Joe Martin, mgr.

Andrews, Ind.—The Andrews Grain Co. has added a Ford 1½-ton, dual-wheeled truck with tight grain box, to its hauling equipment.

Hebron, Ind.—The Hebron Feed Co. has installed a Blue-Streak No. 20 Custom Hammer Mill, operating it with a 6-cylinder auto engine.

Urbana, Ind.—George Tucker is the new manager of the Mutual Grain Co., replacing Solomon Ulshafer who has moved to Missouri.

Livonia, Ind.—E. W. Cauble has installed a self-contained flour mill here, which is now in operation.—O. L. Cauble (owner Pekin Roller Mills, Pekin, Ind.).

Pinola (La Porte p. o.), Ind.—The Pinola Co-op. Co. has been figuring with scale company representatives for new truck scales to be installed in the elevator driveway.

Pierceton, Ind.—Laver Bros. have installed a new Blue Streak Corn Cutter and Grader complete in the elevator they operate here under the name of Pierceton Elvtr. Co.

Evansville, Ind.—A permit for construction of an addition to the Mead Johnson Co.'s plant here, costing \$11,732, has been issued and work on the new addition will start at once.—W. B. C.

Warsaw, Ind.—The Warsaw Milling & Grain Co. has changed from diesel to electric power, installing three enclosed Fairbanks-Morse Motors, two of 5-h.p. each, one of 60-h.p.—H. S. Smith, mgr.

La Fayette, Ind.—The Indiana Seed Law requires seed to be tagged with official tags stating that the seed has been analyzed and found fit for use under Indiana conditions.—Dr. H. R. Kraybill, State Seed Commissioner.

Berne, Ind.—The re-organized Berne Milling Co., operating under the name of Community Exchange since Jan. 24, and under the management of Albert M. Sprunger, has installed a Schutte Hammer Mill and a Burton Feed Mixer. A 30-h.p. motor and V belt drive for the hammer mill will soon be purchased.

Pleasant Mills, Ind.—Painting of a warehouse, and finishing the painting of the elevator with aluminum paint is an improvement scheduled for this spring. During the summer I hope to build a small office outside of the elevator, in which a stove can be put without affecting the fire hazards of the elevator.—A. M. Mauler.

LaCrosse, Ind.—Arrangements have been made by Benes Grain & Feed Co. to have L. J. McMillin add 12,000 bus. additional storage space to its 18,000-bu. elevator this spring. A second leg will also be installed, to have elevating capacity for 2,000 bus. per hour.

More Limestone . . .
In Your Community,
More Grain . . .
In Your Elevator!
Write for 1935 Prices
LEHIGH STONE CO.
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St. John, Ind.—A Eureka Grain Cleaner and a rolling screen corn cleaner are awaiting installation in the local elevator of the E. K. Sowash Grain Co. The elevator has been improved with installation of a truck lift. Mr. Sowash took over and opened the St. John elevator on May 7 of last year. It had previously been closed for a decade.

Columbia City, Ind.—R. I. Mansfield, Chicago, is the prominent speaker scheduled for a dinner meeting of grain and feed dealers and other interested persons at the Presbyterian Church here, Wednesday evening, Mar. 27. The purpose of the meeting is to express and find new uses for agricultural products. L. R. Rumsyre, South Whitley, is acting chairman.

Raber (Columbia City p. o.), Ind.—The Raber Co-op Co., managed by Royal D. Clapp, has had its elevator driveway fitted with a new McMillin Overhead Electric Truck Lift. Just added to the service equipment of the company is a 5-ton Diamond T, dual-wheeled truck, with a combination of a tight box for hauling grain, and a stake bed for hauling livestock. The new truck will be used in delivery of feed and coal, farm machinery to farmers, and in hauling grain and livestock from the farms to the elevator. The company contemplates building a farm implement shed and showroom this fall.

Lapel, Ind.—Citizens Grain Co., incorporated; capital stock, 1,000 shares of \$10 par value; incorporators: George F. Jerrell, Everett McClintock, C. W. Martin and others; to engage in the grain and feed business. The old Shetterly elevator and mill which has been idle for several years, has been bot by the new company, which will remodel it, install new machinery and place it in operation as soon as the improvements are completed. The company will handle grain and do grinding, handling a number of sidelines, including coal. George Jerrell, who has had 30 years of experience in the grain business, will be the manager.

Wyatt, Ind.—The Wyatt Grain Co. has just bot a new Ford V8 truck with capacity for carrying 1½ tons. It has six tires and a tight wood grain box. This is an addition to the company's transport equipment, since it already has a 1-ton International Truck for delivery purposes. "The new truck," says C. A. Haab, "will be used principally for bringing grain in from the farms. The farmers are coming more and more to leaning on the grain dealers in their demand for service. Now they call up when they are ready to sell their grain, and ask that a truck be sent out for it. That is the main reason for the new truck."

INDIANAPOLIS LETTER

Indianapolis, Ind.—Headquarters of the National Food Brokers Ass'n have been moved to 709 East Maple Road, the old quarters having been outgrown due to increased business.

Last week the Indiana Grain Dealers Association wired a vigorous protest to Hoosier representatives in Congress against H. R. 5585 amending the AAA law and H. R. 672 the Jones Commodity Exchange bill. Grain merchants everywhere are protesting against all legislation designed to strangle legitimate business.

Indiana Grain Producers, Inc., is the new name of the Central States Grain Ass'n, which took the new title on Mar. 4 and changed the organization from a non-stock to a stock company. Officers are as follows: Pres., William Pruesner, of Decker, Ind.; vice-pres., Frank Arn, Montezuma; sec'y-treas., B. E. Benner, Mays. The capitalization of the organization is to be \$200,000.

Everett E. Allison, treas. and manager of the Steinhardt Grain Co., of this city, gave an address on "Grain—Its Agriculture and Market" to the Indianapolis Rotary Club at its regular noon luncheon at the Claypool Hotel on Mar. 5. Mr. Allison also made reference in his address to legislation and its effects, after outlining the growth of agriculture and showing why an adequate system of grain distribution is required.

Frank M. Montgomery, widely known Indianapolis grain broker, of the firm of Montgomery & McConnell, died on Mar. 12. He was 72 years old and had been engaged in the grain brokerage business for nearly 40 years. Death followed a stroke on Feb. 25. Mr. Montgomery was born on a farm near Monticello. Later he went to Clarks Hill and came to Indianapolis in 1896, when he became affiliated with the grain brokerage firm of E. W. Bassett. Since that time he has had an office in the Board of Trade Bldg., both the old and the new.—W. B. C.

IOWA

Ionia, Ia.—R. E. Bonfig has purchased the local elevator from Nick Jacobs.

Dinsdale, Ia.—Mrs. H. W. Johnston has purchased the assets of the Dinsdale Grain & Lbr. Co. and has been given a deed to the property.

Mason City, Ia., Mar. 12.—The U. S. Senate has confirmed the appointment of Edward G. Dunn as U. S. attorney for the Northern District of Iowa.

Lone Tree, Ia.—Frederick H. Krichner, for 20 years in the grain and coal business at this point, died recently, at the age of 70 years. He is survived by his widow and one son.

Clarinda, Ia.—Lee Norris has been sentenced to five years in prison for complicity in the theft of clover seed from the Berry Seed Co. here last month. He pleaded guilty.—A. T.

Moneta, Ia.—Dow, Hale & Lerigo will remodel their elevator here, installing new legs and other equipment. A new cleaner will also be installed. The T. E. Ibberson Co. will do the work.

Crystal Lake, Ia.—Nick Schuver, former manager of the Farmers Elevator Co.'s elevator at Bremer, Ia., has been appointed manager of the Farmers Co-op. Elevator Ass'n's elevator at this point. He has moved his family here.

Bremer, Ia.—Walter Lohman, former assistant to Nick Schuver, manager of the Farmers Elevator Co.'s elevator for the last six years, has been appointed manager following the resignation of Mr. Schuver, who has taken a position at Crystal Lake, Ia.

Luther, Ia.—For the second time within six months, thieves broke into the Farmers Co-op. Elevator Co.'s elevator here, gaining entrance by breaking the lock on a side door, but gained nothing for their trouble, as there was no money in the elevator office at the time.

Gilman, Ia.—At the annual meeting of the Farmers Elevator Co. here recently, H. E. Jenks was continued as manager. S. L. Ludlow was elected pres., and John Meling sec'y. A profit of \$3,845 was reported for the year.—Art Torkelson, with Lamson Bros. & Co.

Estherville, Ia.—The Stockdale & Maack Co. purchased the Jones elevator here and is having the T. E. Ibberson Co. rebuild and remodel it. The work is under way. A new S-S Head Drive, new G. E. Motors, new legs and other improvements are being made.

Des Moines, Ia.—E. M. Mineough and James Wallace have bot the Ideal Sales Co. from George Williams and will continue the operation of the company. In addition to its former business as feed distributors, the new owners will manufacture three brands of feed.

LeMars, Ia.—If crops are good this year, the proposition of resuming business will be put up to the stockholders of the Farmers Elevator Co. here. The company is now in good financial condition, having nearly \$5,000 in the bank. It still has the elevator building, which contains some grain in storage, and some other small assets.

Montour, Ia.—The elevator here purchased last fall by J. P. Walters, of Toledo, will be opened for business soon. New scales are being installed, and a building (which was used as a ticket office at the Tama County Fair in Toledo) has been moved to this point and is being repaired and will be used as an office. John Walters, son of the new owner, will be the manager of the elevator. Montour and vicinity have been without an elevator since Cronk Bros. closed their business here last summer.

George, Ia.—J. A. Seward, manager of the Farmers Co-op. Elevator Co.'s elevator at Sheldon, Ia., for the last 10 years, has been appointed manager of the Farmers Elevator Co.'s elevator here, taking over his new duties Mar. 21. He succeeds Gayle Snedecor, who has taken a position at Scranton, as reported in the Mar. 13 Journals. Mr. Seward's family will join him here at the end of the school year.

KANSAS

Mayfield, Kan.—The Hunter Milling Co. sustained slight damage to its elevator on Mar. 15.

Cheney, Kan.—Windstorm slightly damaged the office and west elevator of G. F. Hilts on Mar. 15.

Frederick, Kan.—Windstorm slightly damaged the elevator of the H. D. Lee Flour Mills Co. on Mar. 15.

Portland, Kan.—The elevator of the Hunter Milling Co. was slightly damaged by windstorm on Mar. 15.

Mt. Hope, Kan.—The Farmers Co-op. Elevator Co. is planning on building a 30,000 to 50,000-bu. concrete elevator.

Belle Plaine, Kan.—The elevator of the Hunter Milling Co. was slightly damaged by windstorm on Mar. 15.

Weir, Kan.—The elevator of Mrs. Blake H. Mayer, operating as Weir Grain & Feed Co., was damaged by windstorm on Mar. 7.

Wakeeney, Kan.—The Farmers National Warehouse Corp. sustained slight windstorm damage to its elevator recently.

Buffalo Park, Kan.—The Farmers National Warehouse Corp. sustained slight windstorm damage to its elevator recently.

Claudell, Kan.—The Claudell Farmers Elevator & Shipping Ass'n sustained slight windstorm damage to its elevator on Mar. 15.

Larned, Kan.—Pawnee County Co-op. Ass'n has wrecked its Missouri Pacific Elevator, which has been in use for several years.

Vandale Station (Haysville p. o.), Kan.—On Mar. 3, at 11 p. m., windstorm slightly damaged the feed mill and warehouse of W. J. Stevens.

Frederick, Kan.—The local elevator of C. D. Jennings, of Hutchinson, Kan., burned early in the morning of Mar. 16. Partial insurance was carried.

Garfield, Kan.—Billie Johnston, manager of the Kansas Grain Co.'s elevator here for the past year, is reported to have closed the elevator and moved his family to Hopewell.

Hesston, Kan.—Roy S. Troyer has purchased the King Estate interest in the Hesston Milling Co. In 1931 Mr. Troyer became manager of the feed mill for King & Fisher, who purchased the plant about five years ago. Harold Fisher is the other partner. Improvements under way include lowering the scales to the ground level, constructing a long alleyway, with a grain dump, the entire alleyway being put under a roof, making it possible to load or unload in any kind of weather. A new and larger hammer mill will be installed also. The office was recently moved to the south side of the mill.

KENTUCKY

Louisville, Ky.—On Mar. 16 windstorm damaged the roof of the Ovenready Plant of Ballard & Ballard, Inc., which is located on Barrett Ave. There was also some resulting damage to stock.

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District offices in Chicago, St. Louis, Minneapolis and other large Cities
ROBERTSON PROTECTED METAL ROOFING AND SIDING IS STRONG AND CORROSION-PROOF

Burgin, Ky.—On Mar. 4 wind blew out a window, damaged the roof and tore some metal siding off the buildings owned by Clell Coleman, elevator operator.

Central City, Ky.—The Underwood Bros., from Graham, Ky., opened a milling business here on Mar. 4. They are equipped to grind and crush grains of all kinds.

Leitchfield, Ky.—Lee's Dairy Sweet Feed Mill has completed installation of a new feed mixer and is now producing livestock and poultry feeds. This is a new plant under the management of Roy Lee.

MARYLAND

Snow Hill, Md.—Delmarva Milling Co., incorporated; capital stock, 500 shares, par value \$100 each; incorporators: Howard S. Rogers, Albert N. and Robert N. Stagg, all of Snow Hill; to deal in flour, meal, etc.

Baltimore, Md.—Blanchard Randall, Jr., a member of the grain firm of Gill & Fisher, of this city, and a former pres. of the Chamber of Commerce, the youngest man ever to serve as pres. of that body, is a candidate for the Republican nomination for mayor of this city. The primary election will be held Apr. 2, and the election May 7. While there are two other candidates for the nomination, Mr. Randall seems to have the strongest backing, having the support of many of the leaders of the party.

MICHIGAN

Detroit, Mich.—Simon E. Dunn has organized the D. & L. Feed Co., which has a capital stock of \$25,000.

Custer, Mich.—The Kaleva Produce Co. recently sustained damage to its stock by fire of unknown origin.

Detroit, Mich.—The new general manager of A. K. Zinn & Co., grain and feed dealers of this city, is Harley Robinson.

All bean producing sections of the state report thefts of beans from elevators, which seems to be on the increase.

Niles, Mich.—Heide's Flour Mill started operations on Mar. 8, grinding feed and meal, and two weeks later began manufacturing flour.

Fowler, Mich.—Leo Hengesbach, of Westphalia, has been appointed manager of the Farmers Co-op. Elvtr. Co.'s elevator here, succeeding Walter S. Brown, who has been manager for nearly five years.

Marshall, Mich.—W. A. Coombs, Jr., who operated the Marshall Milling Co., at one time known as the Rice Creek Mill, has ceased operating the mill and Marshall has no flour mill. At one time there were several flour mills here.

Detroit, Mich.—The American Malting Co. expects to have its new 500,000-bu. malting elevator, being constructed by the Burrell Engineering & Const. Co., ready to operate soon. Installation of conveying machinery has been completed.

Brown City, Mich.—The Eastern Michigan Bean Dealers Ass'n met in this city on the evening of Mar. 13, opening with a banquet at the hotel, followed by a business meeting and program. Carl Wendt was in charge of the local arrangements.

Mt. Pleasant, Mich.—W. J. Hazlewood, manager of the Mt. Pleasant Co-op. Elvtr. Co.'s elevator for the past 14 years, has resigned on account of poor health. He has been succeeded by Raymond Cook, of Battle Creek, former assistant manager of the Battle Creek Co-op. Elvtr. Co.'s elevator.

Saginaw, Mich.—William I. Biles, well known in the grain and bean industry, died Mar. 19 in an automobile accident near this city. Returning from Akron, Mich., Mr. Biles was riding alone, when his car hurtled over a concrete culvert at the intersection of two roads. Mr. Biles was pres. of the Michigan Bean Shippers Ass'n from 1926 to 1928, and held membership in the ass'n for 36 years, during all of which time he was active in its affairs. As a young man he connected with the Saginaw Milling Co. and in 1908 was made general manager of the concern, which position he held until the company discontinued business. Recently he went into business on his own account, operating as the Saginaw Mills, his plant including an elevator. His wife and one son survive him.

Sturgis, Mich.—The Sturgis Grain Co. is erecting a new warehouse and office, 40x80 feet, of frame construction, with cement floor, replacing a smaller building, 30x40 feet, built only two years ago but which has already been outgrown. The warehouse will house the company's implement business.

Custer, Mich.—The oldest landmark of the village, the large McKenzie-Saxton grain elevator and warehouse, burned at about 7:30 p. m., on Mar. 8; loss, estimated at \$6,000; building and contents partly insured. A carload of wheat, an undetermined quantity of rye, seed and beans and five carloads of potatoes were destroyed also. The building was owned by the late Elmer McKenzie. About six years ago Mr. Saxton purchased an interest in the business, which has since been known as the McKenzie-Saxton elevator and warehouse. It is thought an overheated stove might have caused the fire.

MINNESOTA

Lockhart, Minn.—Fire damaged the St. Anthony & Dakota Elvtr. Co.'s local elevator early this month.

Hanley Falls, Minn.—Ralph Harris has been appointed manager of the Farmers Elvtr. Co.'s elevator here.

Minneapolis, Minn.—Hart Putnam, Cargill Commission Co. salesman, recently submitted to an operation in one of the city's hospitals.

Minneapolis, Minn.—John B. Quinn, one of the oldest grain traders in this city at the time he retired in 1930, died Mar. 7, at the age of 80 years.

Currie, Minn.—A quantity of alfalfa and sweet clover seed valued at \$70 was stolen recently from the Farmers Elvtr. Co.'s elevator here.—Art Torkelson.

Welcome, Minn.—The old Cargill Elvtr., one of Welcome's oldest structures, is being wrecked and sold for lumber. For many years five elevators were located here, only two now remaining.

Waseca, Minn.—The death of Roy E. Bell occurred recently, following an operation, in Minneapolis. Mr. Bell was sec'y of the Everett-Augenbaugh Co., elevator operators, whose headquarters are in Waseca. His age was 52 years.

Minneapolis, Minn.—A charge of 50 cents for weighing and 50 cents for inspection on grain moving to or from a terminal elevator by motor truck, in a quantity less than 1,000 bus., has been inaugurated by the Minnesota Warehouse & Railroad Commission.

St. Paul, Minn.—A bill providing for \$2,000,000 in state funds to be made available to farmers immediately for seed loans was rushed thru the Minnesota Legislature early this month, making it possible for farmers to obtain seed for the spring planting.

Dodge Center, Minn.—As soon as weather permits, Anton O. Olson, whose old elevator is too small to handle his business, expects to erect an elevator where the Chicago & North Western stock yards are now, the latter company intending to tear down at least a part of the yards.

Roseau, Minn.—William Moser has had his hammer mill connected to a 38-h.p. six-cylinder motor. Heretofore the power for the grinder has been furnished by a 15-h.p. electric motor, which is now being replaced by the heavier gas motor, connected to the mill shaft, eliminating the need of a belt.

Bigelow, Minn.—The present plant of the Farmers Elvtr. Co. is being wrecked by the T. E. Ibberson Co., and a new elevator will be built, as well as a large warehouse and feed mill building. This new modern structure (details of which appeared in the Dec. 26 Journals) will be put in operation about June 15.

Duluth, Minn.—James N. McKindley, one of the earliest active grain commission men on the Duluth Board of Trade and who at one time operated his own commission firm, died in a local hospital, Mar. 19, at the age of 75 years. His wife and one daughter survive him. Mr. McKindley was a director of the Board of Trade from 1895 to 1907. He retired from business several years ago.

Lismore, Minn.—The John E. Greig Elvtr. here will have extensive repairs and improvements made, such as building a new driveway, installing a 20-ton Fairbanks Scale and S-S Dumps. A large two-room office will be built. New legs will be installed in the elevator, using Fairbanks-Morse Motors and S-S Head Drives. A new steel boot tank will be installed. The plant will be reroofed and resided and other improvements made. The T. E. Ibberson Co. will do the work.

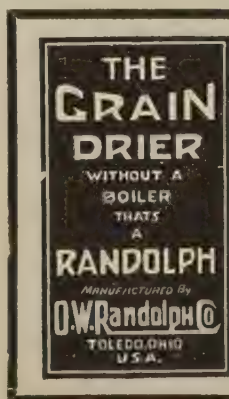
Baudette, Minn.—A new elevator will be erected at this station for the Marvin Grain, Lbr. & Seed Co. The capacity of this plant is to be 15,000 bus., consisting of 14 bins, one leg, 15-ton Fairbanks Auto Truck Scale and S-S High Truck Lift. The building is to be modern in every way, using all metal roofing. This plant is motor driven, using enclosed type ball-bearing Fairbanks-Morse Motors and Starters, conforming with Underwriters' specifications. The T. E. Ibberson Co. has the contract.

Audubon, Minn.—The Audubon Farmers Elvtr. Co. has completed the installation of a 5-h.p. totally enclosed Fairbanks-Morse Motor on an S-S Head Drive in the cupola, a 3-h.p. enclosed type Fairbanks-Morse Motor, using an enclosed type silent chain drive for the 3-unit cleaner and a 2-h.p. enclosed type Fairbanks-Morse Motor on the air compressor in the engine room. This 2-h.p. motor has a three strand tex-rope drive to drive the compressor. A complete new head was built to accommodate this new drive and the legs repaired and straightened so owners can get the fullest benefit of the additional new equipment. All the wiring was done according to the insurance Underwriters' specifications, installing all starters in the office and each are equipped with a push button station operated from the driveway. The T. E. Ibberson Co. did this work.

MISSOURI

Adrian, Mo.—A. B. Harriman, of Sedalia, Mo., has purchased the elevator here from the Farmers Elvtr. & Supply Co., which was for many years managed by George Wyatt. The new owner is improving the driveway and installing a new steel boot-pan.

St. Louis, Mo.—The grain dealers of the St. Louis market have started preparations for the entertainment of the members of the Grain & Feed Dealers National Ass'n who will hold their 39th annual meeting in St. Louis on Sept. 19, 20 and 21, 1935, with headquarters at the Jefferson Hotel. Com'ites have been appointed and plans are getting under way to entertain the largest gathering of grain men in a number of years. There are many points of interest in St. Louis and it is not too early to make plans to attend this meeting.



RANDOLPH DRIERS

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Dehydrators for Alfalfa,
Sweet Corn and Vegetables



Jefferson City, Mo.—A measure has been introduced into the state legislature placing a tax of 2% on storage and warehousing fees as part of the proposed state gross sales tax of 2%. Grain men and millers are protesting the tax.

Concordia, Mo.—Burglars entered the Concordia Farmers Co-op. Co.'s and George Klingenberg's elevators here on the night of Mar. 9. Both safes were opened by a sledge and bar. Ninety dollars in cash was taken from the Farmers elevator and \$225 was taken from the Klingenberg elevator. At least a dozen persons heard the commotion caused by opening the safes but those men were working at the elevator, as it happened about 9:00 in the evening.

KANSAS CITY LETTER

The Continental Export Co. is having an air conditioning system installed in its offices in the local Board of Trade Bldg., and it is also remodeling and enlarging its offices.

The death of John I. Glover, retired grain commission man of this city, occurred on Mar. 13, the result of a cerebral hemorrhage, at his home here. He was 68 years of age.

It is expected that the contract for the rebuilding of the headhouse of the Kansas City Southern Elvtr., Moore-Seaver Grain Co., operator, will be awarded soon. The old headhouse, of wood, burned Jan. 21, as previously reported; the new headhouse will be of re-inforced concrete.

The annual dinner and election of officers of the Kansas City Grain Club was held on Mar. 12 at the Kansas City Club. The election resulted as follows: Pres., E. F. Emmons; vice-pres., E. R. Jessen; sec'y-treas., T. A. O'Sullivan. Directors: Roy E. Swenson, Paul C. Trower, H. J. Sosland, W. J. McNeil, W. B. Young and L. J. Byrne.

Kansas City, Kan.—The question as to whether or not this city shall issue \$300,000 worth of bonds to pay its share of the \$1,500,000 P. W. A. development of a public levee for the city will be decided by the voters at the city election Apr. 2, a separate ballot being provided for that purpose. If the bonds are voted, the long-talked-of terminal elevator will be built. Several firms are said to have already put in bids to lease the house, if built. Those who are opposed to the project contend that the city has no right to use the credit of the city in bond issues for the erection of an elevator to be used by private industry.

MONTANA

Coffee Creek, Mont.—James Zenisek, grain buyer for the Greeley Elvtr. Co.'s elevator here, died at a hospital in Lewistown, at the age of 47 years. He is survived by his widow and one son.

Carter, Mont.—Warren Johnson, of Fort Benton, Mont., has been appointed manager of the Greeley Elvtr. here, succeeding J. H. Garrison, who resigned recently to take a position as seed loan inspector with the government.

Missoula, Mont.—The Montana Flour Mills Co. is still at work reconditioning the plant here recently purchased from the Northern Flour Mills Co., as previously reported, and installing new machinery. It is now expected to have the plant ready for operation by May.

Wolf Point, Mont.—The Equity Co-op. Ass'n has purchased the local elevator of the Montana-Dakota Grain Co. The house will be used for storage at present and will probably be operated regularly after next harvest. This makes the third local elevator owned or controlled by the Equity, a locally owned farmers' organization, which has operated an elevator here for 20 years. The other house is the one formerly known as the Farmers Pool Elvtr.

NEBRASKA

Gordon, Neb.—The Farmers National Warehouse Corp.'s elevator here was broken into, during the night of Mar. 16, the safe blown and approximately \$400 in cash and \$200 in checks stolen.

Omaha, Neb.—Otto A. Horsens, retired superintendent of the former Trans-Mississippi Elvtr. here, died Mar. 14 at his home in this city, at the age of 77 years. His widow and seven children survive him.

Wayne, Neb.—Marcus Kroger, who in 1900 took over the management of a grain elevator here and later purchased the elevator, died Mar. 10, at the age of 70 years. He retired from business last year. His wife and three children survive him.

Hastings, Neb.—Edward J. Herring, a retired grain elevator operator, was found dead in his garage, Mar. 20, from a gunshot wound, believed to have been self-inflicted. He had been in poor health for a year. At one time he was elevator superintendent for the Central Granaries Co., of Lincoln (now out of business) for 25 years.

Schuyler, Neb.—Tax foreclosure for \$14,000 against the Wells-Abbott-Niemann mill property here has been started. About a year and a half ago the mill, one of the largest in the West, burned, since which time the property has not been used, but it is reported that a mill may soon be erected on the same site. The property was sold at foreclosure of the mortgage to J. E. McNally and Gerald Ehrenberger, the former later transferring his interests to Ehrenberger.—A. T.

Omaha, Neb.—A request of Taylor & Co., grain dealers, to erect an office and a scale on the corner of 14th and Izzard streets was denied by the city council after a letter from the Industrial Chemical Laboratories, Inc., was read, opposing the construction. It was contended that the building would block the view and create a traffic hazard. The letter also requested that the city take action on an alleged fire menace created by grain dust from an elevator of Taylor & Co. in the same neighborhood.

Hastings, Neb.—The Hastings Mills, a unit of the Nebraska Consolidated Mills Co., with main office at Omaha, received five bids from contractors for the construction of a re-inforced concrete elevator here. The contract was awarded to the Ryan Const. Co., their bid being the lowest and best submitted. The elevator will consist of 17 bins with a storage capacity of 85,000 bus. In addition to a grain elevator leg and the usual grain spouting, bin valves, etc., the elevator will include a 100-bu. grain drier, grain cleaner, truck dump and a 20-ton truck scale. All the machinery and equipment will be purchased and installed by the Ryan Const. Co. The contract calls for the elevator building to be completed May 25. The bids were received on plans and specifications prepared by Horner & Wyatt.

NEVADA

Carson City, Nev.—A law has been passed in this state limiting the length of passenger trains to 14 cars and of freight trains to 70 cars. Previous to its passage, officials of the Southern Pacific Railway stated that the company might have to shut down its shops at Sparks if the law were passed.

NEW ENGLAND

Boston, Mass.—Members of the Boston Grain & Flour Exchange presented flowers and other gifts to Frank W. Wise, treas. of the exchange since it was organized, on the occasion of his 85th birthday on Mar. 8, which he celebrated by going to his office as usual.

NEW YORK

Tonawanda, N. Y.—The Eastern States Milling Corp. sustained a small sprinkler leakage loss on Mar. 11.

Buffalo, N. Y.—The present union wage scale for grain shovellers is \$3.30 per thousand bus., with \$4.50 for overtime. At a meeting of the Grain Shovelers Union, No. 109, in the Buffalo District, on Mar. 10, wage scales were discussed and the first step thus taken toward framing a new contract for this season. A special meeting will be called to consider the question.

NEW YORK CITY LETTER

New members of the Produce Exchange are Desmond Hallaran and Earle L. Thomas.

On Mar. 11 Julius Baer, an attorney, delivered the third lecture in the Produce Exchange commodity course, the subject being "An Analysis of the Futures Contract for the Trader," and on Mar. 14 "Hedging—Theory and Practice" was the title of another lecture given by B. L. Wells.

W. C. Walther, who had been a member of the Produce Exchange for many years, died at his home in Weehawken, N. J., Mar. 10, at the age of 72 years.

Emil J. Bauer, a member of the Produce Exchange, for many years in charge of the light-erage business of the Erie Railroad, died recently at his home in Rutherford, N. J., at the age of 64 years.

Emile W. Jacques was expelled from membership in the New York Produce Exchange, on Mar. 19, under sec. 32 of the by-laws which governs complaints of members against other members. William C. Bierds, Henry S. Burgo-master and John F. Parry were suspended for three months under the same section.

Augustus Arrance, a grain inspector of the New York Produce Exchange for many years, died at a hospital in Miami, Fla., on Feb. 7, at the age of 66 years. He began his service with the Produce Exchange in 1897, being commissioned as an inspector the following year. His efficient service soon won for him the promotion to chief deputy inspector. He was retired on a pension Mar. 1, 1930, after serving 32 years.

NORTH DAKOTA

Hillsboro, N. D.—The Monarch Elvtr. Co. has installed a Ceresan smut treating machine for treating wheat, oats and barley.

As a part of the national crime roundup, seven alleged wheat smugglers have been arrested in North Dakota, it is reported.—A. T.

Casselton, N. D.—The Casselton Elvtr. Co. has awarded the contract to the T. E. Ibberson Co. for extensive repairs on its elevator. The work will start at once.

Juanita, N. D.—The Minnekota Elvtr. Co. has awarded the contract to the T. E. Ibberson Co. to wreck its plant at this place and move it to Selz, N. D., where it will be rebuilt.

Milton, N. D.—We have re-organized to a co-operative company and changed our name to Farmers Co-op. Elvtr. Co.—A. J. Sjolseth, mgr., Farmers Co-op. Elvtr. Co. [Formerly the Farmers Elvtr. Co.]

Selz, N. D.—The Minnekota Elvtr. Co.'s elevator burned here Saturday evening, Mar. 2, together with a carload of feed corn and some seed wheat. The company has awarded contract to the T. E. Ibberson Co. for the erection of a new elevator.

Grandin, N. D.—The Farmers Grain Co. is having the T. E. Ibberson Co. build an 85,000-bu. elevator with 27 bins, all of them being overhead on 14-foot posts. There will be a full basement under the entire plant. Each of the two legs has 11x6 D.P. buckets, and a double distributor accommodates each leg. The power is a 40-h.p. diesel type Fairbanks-Morse Engine, which drives the entire equipment, including two legs, a big No. 3 cleaner with barley attachment, a No. 70 Simplex cleaner and a P. & R. Grader, along with necessary conveyors and air compressor for the S-S Truck Dump Lift. There is a 15-ton 17'6"x8' Fairbanks-Morse Auto Truck Dump Scale to be installed in the driveway and a 250-bu. hopper scale to be installed 32 feet above the rail on the track side. Three bins each holding a carload or more are accessible to this hopper scale, which allows the owners to draw one-half of the carload direct into the car without going thru the direct spout thru the entire new plant, and are to be steel clad. All the spouting equipment inside is to be first grade material and of large capacity, therefore operating in the most efficient and modern method. In conjunction with this new elevator there is an all new driveway built 14 feet wide with six bins over same, allowing the owners to draw grain into wagons. A 40,000-bu. 12-bin annex is a part of this new plant, the annex being served from a spout from the throat of one of the heads of the elevator. Grain is taken from the annex to the pit of the elevator by means of a 12-inch spiral conveyor. The entire annex is to be covered with 2½-inch corrugated elevator plate and 26-gauge standing seam roofing. A flour house built in conjunction with the main elevator is 18x34 feet.

OHIO

Kettlersville, O.—High winds damaged two doors to the main entrance of the elevator building of the Kettlersville Grain Co. on Mar. 16.

Roxanna (Spring Valley p. o.). O.—Five bags of clover seed valued at \$152 were stolen from the Roxanna Grain Co. Mar. 9.

Massillon, O.—The Buckeye Cereal Co. installed a combined sheller and cleaner, furnished by the Sidney Grain Mch. Co.

West Milton, O.—The roof of the elevator building of Lauda V. Jones and John W. Henderson was damaged by the high winds on Mar. 16 and 17.

Millersville, O.—The new plant of the Pennsylvania Elvtr. & Feed Mill has installed machinery furnished by the Sidney Grain Mch. Co., including Sidney Truck Dump, drag feeder, etc.

Toledo, O.—E. L. Southworth & Co. have leased quarters in the Gardner Bldg. because of their broadened business, which now includes real estate, mortgage loans, bank claims and other financing business.

Wren, O.—The Athena Elvtr. Co. has installed a 1-h.p. GE 3-phase motor to run a fanning mill. This company, managed by C. L. Boltz, acquired the properties of the Wren Elvtr. Co., formerly run by Fred Gehres, last November.

Celina, O.—P. C. Miller, manager of Palmer, Miller Grain Co., who has been taking a rest cure for heart trouble thru the last six months, has so improved that he is expected back on the job at an early date. His many friends will be glad to learn of his improved health.

Piqua, O.—B. F. Williams, driving a Ford car, and accompanied by a young woman, has been obtaining loans from grain dealers in this neighborhood to get home. His car bore Missouri license No. 628-479. Any information regarding his whereabouts will be greatly appreciated by G. N. F. and others.

Trenton, O.—The grain elevator of the Trenton Farmers Supply Co. was demolished, on Mar. 10, when 16 cars of a B. & O. freight train of 54 cars left the tracks. The elevator was toppled on the tracks of the C. & L. E. Railroad. A brake bar on one of the freight cars dropped to the tracks, causing the car to buckle and derailing the other cars.

Willshire, O.—W. A. Fields, the last manager of the Willshire Equity Exchange before that institution was forced into bankruptcy, has opened a feed store and grinding establishment. He is installing a hammer mill. The Willshire and Schumm elevators of the Willshire Equity Exchange have been closed since last November. W. J. Schumm is trustee.

Celina, O.—Purchase of a 1½-ton truck with dual rear wheels and a steel bottomed tight grain box, is planned by the Celina Equity Exchange Co. This will be an addition to the company's hauling equipment, as it already has a one-ton International Truck. The new truck will be purchased before harvest, and will be used principally for hauling in grain from farmers.

Toledo, O.—During the second week of this month fire threatened the plant of the Larowe Milling Co. twice in one day, the first one starting in a shaft above a motor and being extinguished before much damage was done, and the second one being caused by a defective heating unit used for cooking soybeans, the damage amounting to about \$100. These fires were in a five-story building adjacent to the 300-foot grain elevator.

Centerburg, O.—The 3,000-pound safe of the H. W. Updike Warehouse & Grain Elvtr. was blown open with nitroglycerin at 3:20 a. m., Mar. 11. The burglars obtained approximately \$75 in cash and several checks. So great was the explosion that the front and inner doors of the safe were blown off, while the heavy back was deposited in the wall. The blast shook the entire block and wrecked some of the office equipment near the safe. An adding machine was badly damaged. Several finger prints were found on the safe which may aid in apprehending the thieves.

Toledo, O.—A large portion of the old trading floor of the Produce Exchange Bldg., where for many years grain trading in this city was carried on, will again become trading area for the Board of Trade. Leases were signed early this month for four large rooms on the third floor of the Produce Exchange Bldg. by the Board of Trade, and a number of grain firms are moving their offices to the building, including the Norris Grain Co., Cargill Grain Co., Patterson Grain Co., East Side Iron Elvtr. Co., H. W. DeVore & Co. and the Federal Grain Supervision offices.

Lancaster, O.—The Shaw-Turner grain elevator here was entered by thieves, during the night of Mar. 8, who gained entrance thru a window. A small box containing 60 cents was the only thing found missing.

Glenmore, O.—The Glenmore Farmers Grain Co., the new name of the Glenmore Grain Co. since the elevator was taken over last year by Lee Little and Voyle Dudgeon, has made extensive property improvements. Just completed was installation of a hammer mill with 30-h.p. motor and multiple V belt drive. Ahead of the hammer mill is an ear corn crusher, run with a 2-inch flat belt from the hammer mill shaft. Mr. Dudgeon planned grinding free during the first two days of operation of the new machinery as an advertising feature. Additional improvements scheduled thru this year include installation of a feed mixer, and of a small burr mill to be used in rough cracking.

COLUMBUS LETTER

The Ohio Millers State Ass'n will hold its 32nd annual convention in this city Apr. 18 and 19, at the Deshler Hotel.

Charles C. Truax, operating as the Maizo Mills, is reported a bankrupt, with assets placed at \$40,150 and liabilities at \$129,800.

H. B. 326 and S. B. 186 establish a tax rate of ½ mill on each bushel of grain and flax and ¼ mill on each bushel of other grains handled during the year.

Ruling No. 68 of the Tax Commission refers to sales of commercial seed inoculants, and states that cultures manufactured and intended for use as inoculants or fertilizing agents for seeds or for use in improving the condition of the ground in which such seeds are, or are not to be planted, or which are used in any way to accelerate or improve the germination of seeds or the development of plants growing therefrom, are fertilizers and as such are not subject to tax.

According to Ruling No. 63 of the Tax Commission, tax on exchange of winter wheat flour for winter wheat is exempt, but on an exchange of blended or spring wheat flour for winter wheat the tax must be collected. The ruling reads: "Charges made by a miller for the grinding of cereals into cereal flour are service charges, regardless of the fact that the flour returned to the person delivering the cereal to be ground is not flour from the identical cereal which he has delivered. This ruling has no application to a transaction where cereal is bartered or exchanged for flour which could not be produced by grinding the cereal so bartered or exchanged."

The thirty-third annual statement of the Ohio Grain Dealers' Mutual Fire Insurance Co. presents a most convincing statement of the efficiency of its management. Its total admitted assets as of Dec. 31, 1934, aggregate \$95,185. This includes U. S. Government bonds \$38,000, Home Owners Loan Corp. bonds \$18,000, Ohio state and municipal bonds \$14,000, first mortgage loan \$10,000, cash \$11,000, while its liabilities aggregated only \$27,000, which includes a voluntary reserve of \$10,000 and a reserve for unearned premiums of \$15,574, leaving a surplus of over \$68,000. With such careful and conservative management, the elevator men of Ohio who are fortunate enough to obtain one of its policies are surely to be congratulated.

The Tax Commissions Ruling No. 58, Sec. 2 of Amended House Bill No. 134 exempts from the tax thereby imposed sales of feeds, seeds, lime and fertilizer. The exemption applies to all sales of these products, regardless of by whom the sale was made or by whom the products are purchased. Feeds as used in this Act shall include the things usually fed farm animals, poultry and stock and includes such items as grain, hay, stock salt, etc. The exemption does not apply on the sale of feed to be used by animals usually called "pet" animals. The exemption of seeds includes all seeds intended to be used for the purpose of planting and sowing. Exemption on the sale of lime includes only lime used for agricultural purposes.

OKLAHOMA

Hunter, Okla.—The elevator of Russell Howard was slightly damaged by windstorm recently.

Okeene, Okla.—Windstorm slightly damaged the elevator of the Midland Flour Milling Co. on Feb. 23.

Lamont, Okla.—The Midland Flour Milling Co. sustained slight windstorm damage to its elevator on Feb. 23.

Kremlin, Okla.—Farmers Grain Co., incorporated; capital stock, \$15,000; incorporators: Edward Leonard, John Wuerflein, Ernest Goll.

Lawton, Okla.—Fire, possibly by flint or similar substance passing thru a hammer mill, damaged the plant of the Chickasha Milling Co. on Mar. 5.

Oklahoma City, Okla.—The Western Feed, Seed & Storage Co., incorporated; capital stock, \$10,000; incorporators: R. B. Claggett, C. W. Dodgen, E. J. Albright.

Meno, Okla.—The Farmers Elvtr. Co. has started the construction of an addition to its elevator which will double its capacity. George Johnston is in charge of the work.

Vici, Okla.—The Farmers Elvtr. Co. has let the contract to the A. F. Roberts Const. Co. for the wrecking of its present frame elevator and the building of a 60,000-bu. concrete house.

Wakita, Okla.—The Farmers Co-op. Elvtr. Co. has leased a brick building here, the front part of which will be remodeled for its cream station, the rear portion being used for a garage and repair shop.

Muskogee, Okla.—The Muskogee Mill & Elvtr. Co. is preparing to build an up-to-date snap corn shelling plant for local and transit shelling. It will also install a sweet feed mixing plant in connection with the shelling plant.—Muskogee Mill & Elvtr. Co., J. W. S. Bower.

Hinton, Okla.—When the Farmers Elvtr. Co.'s elevator here burned last month, as reported in the Journals last number, 6,000 bus. of wheat, 1,000 bus. of corn and 700 bus. of kafir were also destroyed; loss, estimated at \$15,000; partly insured. The company's office, implement shed and a large quantity of feedstuff, as well as coal, were saved. A carload of corn had just been received at the elevator the day of the fire.

Hugo, Okla.—At 7:30 p. m., Mar. 7, fire of undetermined origin damaged the property of the Shawnee Milling Co., operating locally as the Hugo Milling Co. The elevator and a large quantity of grain and feed burned; loss, estimated at \$20,000. The mill had been operating full time, employing two shifts of men. Within a week the work of rebuilding the elevator was started and will be rushed as much as possible. The machinery was almost a total loss. Business is being continued as usual at the mill.

In addition to the Oklahoma Wheat Pool elevators reported in the Journals last number as having been sold recently, the following have also been sold (up to Mar. 23) the buyer's name following the name of the town where the elevator is located: Arapaho, Arapaho Co-op. Elvtr. Ass'n; Beaver, Beaver Co-op. Grain Growers Ass'n; Breckenridge, Breckenridge Co-op. Elvtr. Ass'n; Chattanooga, Farmers Co-op. Elvtr. Ass'n; Cropper, Cropper Co-op. Elvtr. Ass'n; Floris, Floris Co-op. Elvtr. Ass'n; Forgan, Forgan Co-op. Elvtr. Ass'n; Garber, Garber Co-op. Ass'n; Gansel, Gansel Co-op. Elvtr. Ass'n; Homestead, Farmers Co-op. Elvtr. Ass'n; Hooker, Hooker Co-op. Grain Ass'n; Kingfisher, Kingfisher Co-op. Elvtr. Ass'n; Knowles, Knowles Co-op. Elvtr. Ass'n; McWillie, McWillie Co-op. Ass'n; May, May Co-op. Elvtr. Ass'n; Mouser, Mouser Co-op. Elvtr. Ass'n; Sharon, Sharon Co-op. Elvtr. Ass'n; Thomas, Farmers Co-op. Elvtr. Ass'n (four elevators); Walters, Walter Co-op. Elvtr. Ass'n; Waynoka, Waynoka Co-op. Elvtr. Ass'n; Woodward, Woodward Co-op. Elvtr. Ass'n.

PACIFIC NORTHWEST

Battle Ground, Wash.—Feed is being manufactured in Henry Gregorson's plant here for the Dickson Co., whose feed mill at Brush Prairie (this county) burned last month, as reported in the Feb. 27 Journals.

Silverton, Ore.—It is rumored here that if a government loan can be negotiated, the Fischer Flouring Mills, closed since July, 1932, will be reopened soon, with L. H. Fischer, former owner and manager, as manager.

Salem, Ore.—The Oregon National Recovery Act, giving state courts jurisdiction over intra-state violations of the Federal N. R. A. Act, was definitely killed, on Mar. 13, after it had been passed and sent to the governor. The measure was recalled from the governor and the Senate voted to lay it on the table, from which it will not be taken.

Salem, Ore.—House Bill 482 provides for "payment and transfer of a portion of the fees, fines, licenses, taxes, etc., collected into the general fund of the state." This would mean an increase in grain inspection fees within two years.

Prescott, Wash.—The Touchet Valley Grain Growers, Inc., have purchased the Prescott Warehouse Co.'s facilities here, consisting of an elevator and two warehouses, having a total capacity of 340,000 bus., and also plan the erection of a new warehouse this season, to be 50x300 feet. With the addition of the Prescott facilities, the Touchet Valley Grain Growers will have a total storage capacity of 1,500,000 bus.

Toppenish, Wash.—W. M. McGowan and Harry E. Schroeder have formed a partnership under the name of "Old Trading Post" for acquiring and operating the warehouse, feed and fuel business heretofore conducted by the Toppenish Trading Co., operating in the latter company's warehouse on the Northern Pacific right-of-way. Mr. Schroeder will be the active manager of the firm, which will deal in grain and feed and also operate a grinding and cleaning department and handle fuel.

Mt. Vernon, Wash.—Frank C. Johnson, of the Johnson Feed & Seed Co., has leased the building of the Skagit Farmers, Inc., and will move into it soon. He formerly operated in this building as manager of the Skagit Farmers, Inc., and later as manager of the Zeb Seed Co., leaving two years ago to go into business on his own account. The building he has leased contains one of the best small feed mills in this part of the country, being equipped with grinding, mixing, cleaning and oat clipping machinery.

OLYMPIA LETTER

H. B. 137, the Weed Seeds Bill, was reported favorably by the house agricultural com'te and at last report was in rules com'te.

S. B. 191 creates a Federal co-operative agricultural extension fund and transfers of the Smith-Lever and Capper-Ketcham funds to the Federal co-operative agricultural extension fund.

H. B. 512 fixes license fees for persons who do not operate a public warehouse but who buy grain, hay and peas for shipment or milling, and provides that the director of agriculture shall appoint inspectors.

Representative Miller of King County brot out an amendment to the bill exempting food-stuffs intended for human consumption from the 2% sales tax. He stated the substitute merely continues the existing business and occupation tax for which the machinery is already set up and in operation, and adds a 2% pass-on consumers' tax.—F. K. H.

As passed by the House, H. B. 237 would fix the rate on extractive, manufacturing, wholesale and retail uniformly at 1/4 of 1%, plus a "pass on" tax of 2% on retail sales to be administered thru a system of scrip sales to consumers. Feed, fertilizer and various farm supplies are classified as wholesale, in whatever quantity. No exemption is granted to any competitive class or group, co-operative, mutual or otherwise.

S. B. 155, the State A. A. A. Bill, supports the national A. A. A., reduces the arbitrary powers of the director, gives more power in industry com'tes and continues the marketing agreement system of agricultural adjustment. This bill passed the senate Feb. 25, with only the eight following senators voting against it: Dailey, Duggan, Ferryman, Lovejoy, Miller, Morrow, Norman and Todd. The bill passed the house on Mar. 5 and then went to the governor.

H. B. 511 sets up the grain and hay inspection fees in a separate fund so that they can not be used for other purposes nor diverted to the general fund. This legislation has been needed for years and would have been enacted long ago if the grain dealers had had as efficient an organization as the feed men possess. Lack of such organization has cost the grain dealers in the last few years a loss by diversion to the general fund of over \$50,000, which could just as well have been applied to reduction of grain inspection fees. This is just about the most outstanding lesson I have seen in the results of lack of industry organization.—Floyd Oles, Mgr., Pacific Northwest Feed Ass'n, Inc. [This bill passed the House Mar. 5.]

PENNSYLVANIA

Millerstown Pa.—C. E. A. Craig has recently installed a Sidney Midget Corn Sheller.

Coopersburg, Pa.—James J. Geisinger has purchased a style B Sidney Midget Corn Sheller.

Bedford, Pa.—Injuries suffered by John W. Clabaugh, manager of C. A. Clabaugh & Sons, who operate a grain and feed store here, when his right arm was crushed in the pulley of a grain chopper, resulted in his death on Mar. 11. He was 25 years of age.

SOUTH DAKOTA

Columbia, S. D.—South Dakota Wheat Growers Ass'n is installing a 22-inch attrition feed grinder in its engine room.

Winner, S. D.—The elevator office of C. L. Frescoln here sustained a serious fire damage on Mar. 16. Insurance was carried.

Beresford, S. D.—L. Spracher, who closed his feed mill here last fall and went to Minneapolis, has returned to Beresford and is planning to re-open his mill.

Yale, S. D.—Farmers Elvtr. Co. (an old established company) incorporated; capital stock, \$20,000; incorporators: W. M. Davis, P. J. Walters, J. J. Glanzer.

Beardsley (Parkston p. o.), S. D.—The north elevator of Charles Zehnpenfennig burned at 6 a. m., Mar. 16, together with 6,000 bus. of grain. The elevator was partly insured and the grain fully insured.

TENNESSEE

Union City, Tenn.—The Monroe Milling Co.'s plant here has been bot by the Model Mill Co., of Jackson, Tenn., and the sale has been confirmed thru Chancery Court.

Nashville, Tenn.—A retail feed store has been opened in this city by the Early & Daniel Co., feed manufacturers of Cincinnati, O., to be known as Tuxedo Feed Store, where a full line of the company's feeds will be carried.

TEXAS

Sanger, Tex.—A report from the Sanger Mill & Elvtr. Co. read as follows: "A hard wind lifted a portion of metal roof from the dog house or head of iron clad elevator Sunday night, Mar. 10."

Ft. Worth, Tex.—The Uhlmann Grain Co. has appointed Marion J. Scott solicitor at its local branch, John Bush, manager. Mr. Scott was formerly employed in the same capacity with E. A. Pierce & Co. at their local office.

Houston, Tex.—The Port of Houston Commissioners have voted not to lease the public elevator here to private parties, believing that such action would not be for the best interests of the port. Several weeks ago a grain company made application to take over the elevator.

Fort Worth

The Fastest Growing Grain Market in the Southwest is the logical market for your grain.

Try any of these Fort Worth Grain and Cotton Exchange Members:

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Grains, Stocks, Provisions

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Domestic and Export Grains, Field Seeds

The Ft. Worth Elv. & Whsg. Co.

Federally Licensed Storage, Consignments

Kingsville, Tex.—The Wuensche Mill & Elvtr. Co. has purchased the building formerly owned by the Kingsville Mill & Produce Co., thus adding nearly 10,000 feet of floor space to its large plant. The purchase included also nearly two acres of land. The building will be completely overhauled.

Up to Mar. 23, the following Texas Wheat Pool elevators had been sold in addition to those mentioned in recent numbers of the Journals, the town where the elevator is located being given first, followed by the name of the buyer: Abell, Panhandle Wheat Growers, Inc.; Bovina, Bovina Wheat Growers, Inc.; Boydston, Groom Wheat Growers, Inc.; Conway, Conway Wheat Growers, Inc.; Dimmitt, Dimmitt Wheat Growers (two elevators); Friona, Friona Wheat Growers, Inc. (two elevators); Groom, Groom Wheat Growers, Inc.; Gruver, Gruver Wheat Growers, Inc.; Hale Center, Hale Center Wheat Growers, Inc.; Happy, Happy Wheat Growers, Inc.; Heaton, Gray County Wheat Growers, Inc.; Kafir Switch, Tulla Wheat Growers, Inc. (portable); Lee Switch, Lee Wheat Growers, Inc. (two elevators); Lockney, Lockney Wheat Growers, Inc.; Mallett, Stratford Wheat Growers, Inc. (portable); Pampa, Gray County Wheat Growers, Inc.; Panhandle, Panhandle Wheat Growers, Inc.; Perryton, Perryton Wheat Growers, Inc.; Plainview, Plainview Wheat Growers, Inc.; Pomeroy, Panhandle Wheat Growers, Inc. (portable); Pullman, Pullman Wheat Growers, Inc.; Spearman, Spearman Wheat Growers, Inc.; Stratford, Stratford Wheat Growers, Inc.; Texhoma, Texhoma Wheat Growers, Inc.; Tulla, Tulla Wheat Growers, Inc.; Waka, Waka Wheat Growers, Inc. (portable); Edmondson, Edmondson Wheat Growers, Inc.

WISCONSIN

Pepin, Wis.—Vaughn DeMarce has been appointed manager of the John Dill Co.'s elevator here.

Sugar Bush, Wis.—Between 2 and 3 p. m. on Mar. 14 fire of unknown origin damaged the feed mill of the Sugar Bush Milling Co.

Strum, Wis.—The Co-op. Farmers Elvtr. Co. is installing a hammer mill at its elevator, to be operated by electricity.—J. M. Olson.

New Franken, Wis.—A fire, caused probably by a dirty motor causing friction, damaged the feed mill of A. L. Grelling on Mar. 9 about noon.

Eau Claire, Wis.—The Eau Claire Seed & Feed Co. has added a Kelly Duplex Corn Cracker and Grader to the equipment of its feed mill.

Milwaukee, Wis.—The rate of interest for April has been determined by the finance com'te of the Milwaukee Grain & Stock Exchange at 5 1/2% per annum.

Superior, Wis.—Jesse George Hall died Mar. 3 at the age of 68 years. He retired a year ago as foreman for the Cargill Grain Co. His widow and one son survive him.

Milwaukee, Wis.—The strike of 130 cereal and flour workers at the Charles A. Krause Milling Co.'s plant was settled on Mar. 21. Terms call for re-instatement of all men on the payroll for 30 days prior to the strike and for continuation of the contract with the flour and cereal workers' union.

Madison, Wis.—Plymouth Feed Concentrates Co. (a Delaware corporation) has filed papers to do business in Wisconsin; authorized capital stock, 100 shares of no par value, with \$5,000 paid in; to manufacture animal feed and food products. The company's Wisconsin representative is C. E. Blake, of Madison.

Kewaskum, Wis.—The death of Dave Rosenheimer, of the L. Rosenheimer Co., occurred on Mar. 7. He was reputed to be one of the most successful feed merchants in Wisconsin. He was also president of several banks at the time of his death, having organized a number of banks during his business career, all of which are said to be still operating.

Milwaukee, Wis.—At the annual caucus of the Milwaukee Grain & Stock Exchange, held Mar. 16, all the present officers were re-nominated, as follows: For pres., O. R. Sickert; first vice-pres., J. V. Lauer; second vice-pres., E. S. Terry; sec'y-treas., H. A. Plumb. Directors (three to be elected): Curt Kanow, G. W. Kruse, Herbert H. Ladish, W. C. Holstein, Roy L. Campbell, L. J. Beck, Walter G. Zinn, L. J. Keefe and Arthur J. Riebs. The election will be held on Apr. 1.

Grain Carriers

The Soo will be open Apr. 15 in the opinion of marine men.

Grain and grain products, loaded during the week ended Mar. 9 totaled 26,981 cars, against 29,767 a year ago, as reported by the Ass'n of American Railroads.

Since 1905 the barge canal has cost the taxpayers of New York state more than \$150,000,000, \$6,000,000 being the annual interest on the canal bonds, to which must be added the \$4,000,000 annual operating cost. Traffic is so light, at 3,000,000 tons a year, that the cost of hauling on the canal is excessive.

The average distance American railroads transport freight has increased 11 per cent in the last decade, while the average rail revenue per ton has decreased one-half of one per cent. Railroads in the past have charged an excessively high rate on local traffic from point to point on their own line, being without competition, while cutting the rate on long distance movement against other rail carriers. Now the trucks are taking the short haul business, so the rails must raise their rates on long distance movement to a remunerative figure as far as permitted by water or highway competition.

Bill to Regulate Water Carriers

Regulation of water carriers under the Eastman Bill, S1632, was opposed before the joint committees of House and Senate by RENE A. STIEGLER, general agent of the Board of Commissioners of the Port of New Orleans, who said: Any definition which restricts the term "tramp" to the handling of cargo to one shipper has the practical effect of disqualifying from tramp service almost everything now moving on tramp ships.

The proposed rule on tramp ships will give the shipper of a full shipload the advantage over the smaller shipper who formerly used tramp ships and who would be compelled to use the regulated service. The definition of the term tramp as used herein with all the discriminations that would follow if placed into effect can not be condemned too strongly.

Section 203-H also places under Interstate Commerce Commission control any warehouse operated in connection with the wharf and it does not attempt to control a warehouse a few feet away not operated in connection with the wharf. Thus the warehouse operated by a wharf company would be at a very distinct disadvantage in trying to compete for business with warehouses located away from the wharf because the shipside warehouses would have their rates made public, whereas the other warehouses could make whatever arrangements they saw fit to control the business.

The Interstate Commerce Commission, under the provisions of section 204-A, would have the right to control the docks, warehouses, grain elevators and bulk commodity handling plants at United States ports whereas similar facilities such as these in competitive foreign ports, such as Montreal, would be unregulated and it is impossible to expect that people using regulated facilities could conduct their business as efficiently and expeditiously as they could if they use facilities which are not burdened with regulations.

J. B. MCGINNIS, of the Memphis, Tenn., Harbor Commission, appeared in opposition to the bill. He knew of no public demand for such regulation as that proposed. He objected to regulation of water carriers by the commission, declaring that regulation of the water lines should be limited to common carriers with the objection of preventing rebating and discriminations.

EDWARD HINMAN, appearing for the Warehousemen's Ass'n of the Port of New York, approved the basic regulatory principles of the Eastman bill. He objected to implied "regulatory powers over voluntary commercial storage of wharfingers."

J. L. BOWLUS, traffic manager Milwaukee Grain & Stock Exchange, urged that the section dealing with wharfingers be eliminated.

Decisions and New Complaints

Before the Interstate Commerce Commission:

No. 25403, Washburn-Crosby Co., v. C., B. & Q., has been dismissed by the Commission finding the rates on wheat from Kansas, Nebraska and Colorado milled at Kansas City, Mo., and products to Milwaukee, and points in Illinois, Iowa and Missouri were not unreasonable.

No. 26571, Southwestern Millers' League, v. C. & O. By examiner Harold M. Brown. Dismissal proposed. Rates charged, wheat, points in the western district to points in Kansas and Nebraska, there milled in transit and reshipped as wheat flour to destinations on the Big Sandy division of the Chesapeake & Ohio in Kentucky, not shown to have been or to be unreasonable or otherwise unlawful.

Deterioration after Purchase at Buyer's Risk

The Acton Co., Philadelphia, Pa., plaintiff, v. Dreyer Commission Co., St. Louis, Mo., defendant, before Feed Arbitration Committee of the Grain and Feed Dealers National Ass'n, composed of Ward A. Brown, D. G. Lowell and A. F. Hopkins.

Plaintiff bought from defendant on May 5, 1933, 300 tons of pure wheat bran, shipment 100 tons each July, August and September, usual terms, lake-and-rail or all-rail, seller's option, at \$19.80 per ton c. a. f. Philadelphia. The shipment P. M. 89038, Ex-SLSF-163328, is an application on the August portion of the contract and the only shipment in controversy.

Defendant, beginning on July 31 and repeatedly thereafter for several days, attempted to get shipping instructions from the plaintiff with little success, but, finally, tender was made of the car and shipment accepted to Milwaukee, Wis., for storage.

The shipment was made on Aug. 3 from Kansas City and the car arrived in Milwaukee Aug. 8 and was unloaded by the railroad company on Aug. 18. On the same day, invoice and draft were forwarded to plaintiff covering the transaction.

Car was held at Milwaukee by plaintiff and reloaded for shipment "East" on plaintiff's instructions on Sept. 15, arriving at destination on Sept. 22 and reported to the defendant as having arrived lumpy and sour on Sept. 26. Considerable evidence was introduced regarding application of the car in question on contract; also, correspondence as to various-sized cars applicable, and also correspondence from the original shipper of the car, the Rodney Milling Co., of Kansas City, who offered a basis in settlement. But all of these have no bearing on the case, as the question involved is entirely one of seller's liability as to condition.

Correspondence from the railroad company shows that no exceptions were made by them as to the feed being out of condition on original unloading at Milwaukee and on the date of unloading there, the car in question became the property of the plaintiff company.

If the car in question had billed straight thru to its final destination in the east, then the defendant company would have been responsible for its good condition on arrival, barring faulty equipment or negligence on the part of the railroad. But when this car was billed to Milwaukee for storage for plaintiff's account, the responsibility of the defendant company ceased upon unloading of the shipment at Milwaukee and payment of draft with proper papers attached.

Any claim which the plaintiff might have as to the condition of this feed on arrival at final destination is strictly against the carriers rather than the defendant. Therefore, the committee finds in favor of the defendant, the Dreyer Commission Co., and assesses the cost of arbitration against the plaintiff, the Acton Company.

The large dairymen's milk producer ass'n at Chicago has voted against government by any code.

Regulation of Water Carriers Opposed

J. S. Brown, manager of the Transportation Department of the Chicago Board of Trade, speaking before the Senate Committee on the Eastman Bill to regulate water carriers, said:

I appear here in opposition to the proposed regulation by the Interstate Commerce Commission of the so-called bulk freighters which come within the classification of contract water carriers in the bill S. 1632. It is in these lake vessels that bulk grains are shipped from Chicago and other western lake ports to the various eastern lake ports, principally Buffalo, New York, and Georgian Bay ports.

The Chicago Board of Trade is also opposed to the proposed regulation of wharfingers because as we understand from the definition of the term wharfinger in the bill, it is intended that the Interstate Commerce Commission will assume regulatory powers over both private and public grain elevator operators.

The lake cargo rates during the past few seasons have been considered by the vessel agents and owners as rather low, and any increase in them, resulting from regulation of contract carriers by the Interstate Commerce Commission, or any other regulatory body, would tend to lessen the movement of grain by lake vessels, and the result of this would be an increase in the price of the grain to the eastern consumers, or a lower price to the producers of grain or borne partly by both.

We assert that regulation of the water carriers which are used in the transportation of grain on the Great Lakes will not be in the public interest, and none has been shown. In our opinion, regulation would eventually increase the transportation costs which the farmer must pay, at least, in part, and the consumer would also find that the cost of delivery to him would be increased.

Inasmuch as there is admittedly no competition for the carriage of grain between the contract and common carriers by water, we believe that prescribing minimum rates for the contract carriers would increase the cost of transporting bulk grain to the detriment of the producer and the consumer without in any way being helpful to the common carriers by water or to the public.

The other provisions of the Bill requiring contract carriers to obtain permits, together with the added expense of keeping accounts, records and reports cannot have any other effect than to increase the cost of transporting bulk grain on the Great Lakes with result that all of such added costs must be borne by the grain and come out of the farmer who produces it or the person who consumes it or both.

Should the Congress pass a bill for regulating the contract lake vessels in the transportation of grain on the Great Lakes, we ask that appropriate provision be made in the law requiring that the rail carriers to and from the lake ports on lake traffic be prohibited from exacting a greater charge for the rail haul to and from such ports than on the same grain traffic interchanged with another rail carrier at the same port or ports. This safeguard is necessary to prevent the rail carriers in the West from charging more to Chicago when the grain is reforwarded via lake than on grain from the same origin point which is reforwarded from Chicago via rail, and similarly to prevent the rail carriers from eastern lake ports, such as Buffalo, from charging more on grain received from the lakes than on grain which is received from their western rail carriers at Buffalo for the same point of destination.

The spreads between the all-rail rates from Chicago and the at-and-east rates from Buffalo are so small, taking Boston for example, that there is scarcely sufficient margin to pay for the lake cargo rates and the other expenses, such as vessel agent's brokerage, cargo insurance and outturn insurance. For example, on wheat the spread is but 3.2 cents per bushel; on corn and rye 2.92 cents per bushel; on oats 1.74 cents per bushel, and on barley 2.36 cents per bushel. To Baltimore the spread between the all-rail rates from Chicago and the at-and-east rates from Buffalo are less than the costs of transportation via the lake from Chicago to Buffalo. For example, on corn, which constitutes the bulk of the grain movement via lake for domestic consumption in the East, the spread is but 1.52 cents per bushel. The bare cargo rate is often greater than 1½ cents per bushel. The spread on oats is but 0.44 cents per bushel or only about ¼ of the bare cargo rate. This comes about because the rail rates from Buffalo ex-lake are relatively higher than the rail rates from Chicago and these higher rates from Buffalo are designed to prevent the shipping of grain via the lakes.

Eastern Washington wheat growers in meeting Mar. 20 adopted a resolution that no foreign wheat be shipped in unless an equal amount was shipped from the Northwest.—F. K. H.

Field Seeds

Sheboygan, Wis.—The Mayr Seed & Feed Store has been opened.

Findlay, O.—Insley's Feed & Seed Store has been opened by Ray Insley.

Perry, Ia.—C. O. Gottschalk has opened a retail outlet for the Midwest Seed Co.

Marshalltown, Ia.—G. F. Kersey has leased a building in which to open a seed store.

Mayville, N. D.—C. H. Oien will conduct a new seed store for the Peterson-Biddick Co.

Lynnville, Ia.—Ira Terpstra has purchased a building in which to conduct his seed business.

Winona, Minn.—A retail store has been opened in its new building by the Northern Field Seed Co.

Graceville, Minn.—The Thief River Seed House has engaged in the seed business here and also will retail feed.

Fort Dodge, Ia.—A wholesale branch has been established here by Northrup, King & Co., of Minneapolis, Minn.

Little Rock, Ark.—The Bass-Isgrig Seed Co. has considerably enlarged its quarters to handle side lines such as garden tools and chicken feeds.

New York, N. Y.—The Chanderlin Seed Co. has been formed by Chas. Chanderlin to wholesale grass seeds, with quarters in the Starrett-Lehigh building.

Nebraska City, Neb.—The Earl E. May Seed Co., of Shenandoah, Ia., has opened a store at this city in charge of P. O. Crouch, who is sec'y of the local Chamber of Commerce.

Evansville, Ind.—The wheat improvement campaign conducted for the past five years has been so successful that Igleheart Bros. will continue it this year under the supervision of S. E. Skiver of Purdue. Control of wild garlic, seed treatment, and dissemination of better seed are the three points of the program.—W. B. C.

Directory

Grass and Field Seed Dealers

CRAWFORDSVILLE, IND.

Crabbs, Reynolds, Taylor Co., clover, timothy.

FARINA, ILL.

Ging & Co., Red Top—carloads or less.

GIBSON CITY, ILL.

Noble Bros., wholesale field seeds.

PAULDING, O.

Stoller's Seed House, wholesale field seeds.

ST. LOUIS, MO.

Mangelsdorf & Bro., Ed. F., wholesale field seeds.

Cornell Seed Co., field and garden seeds.

SIOUX CITY, IOWA

Sioux City Seed Co., seed merchants.

FIELD SEEDS

WRITE OR WIRE FOR PRICES

SIOUX CITY SEED CO.

Truck Service from the following warehouses:

Sioux City	- - - - -	Iowa
Sioux Falls	- - - - -	So. Dak.
Norfolk	- - - - -	Nebr.
Carroll	- - - - -	Iowa
Billings	- - - - -	Mont.
Algona	- - - - -	Iowa
Fairmont	- - - - -	Minn.
Albert Lea	- - - - -	Minn.

Samples Furnished On Request

Bloomfield, Ia.—Floyd Brown, seedsman, has purchased a building near the Wabash station to be used as a seed warehouse.

Galesburg, Ill.—The DeForest Feed & Seed Co. has engaged in business under the management of D. D. DeForest, who was for 6 years with the Consumers Fuel, Grain & Seed Co.

The cranberry bean is a newer variety in Michigan that commands double the price of the ordinary white bean. The yield averages 70% of that of the ordinary navy bean. The method of cultivation is the same.

The Minnesota Department of Agriculture is about to start a vigorous spring campaign against such weeds as creeping jenny, leafy spurge and other parasites, under C. P. Bull, director of the weed and seed division.

Minneapolis, Minn.—Delay by the government in supplying seed to farmers otherwise unable to sow wheat is reported to be holding back spring seeding. In North Dakota the seed situation is already very serious.

Most serious of all dangers in the southern Iowa seed corn shortage is that much corn from northern and north central Iowa which is being trucked in, is likely to be planted. This corn usually is sound and bright, but when planted in southern Iowa, it is likely to yield 20 to 30 per cent less than might be had from well adapted seed, says H. D. Hughes, Iowa State College Farm Crops head.

Omaha, Neb.—Three hundred carloads of grain sent out over the state by the federal seed stocks com'te, mostly are still in elevators because farmers can't get the money to pay for the seed. Most of the three hundred carloads—largely oats with some wheat and barley—were shipped some time ago, according to P. H. Stewart, local representative of the com'te. Two hundred carloads will be shipped soon. All this has gone to country elevators, and most of it has stayed there. Custer County, for example, got 90,000 bus., and only a few bushels have been taken out by farmers. Boyd County got 30,000 bus., and none has gone to farmers yet.

Washington, D. C.—"Early Indiana Laredo" will be acceptable for use this season as a label for Indiana grown soybean seed of a variety that resembles Laredo but matures earlier than the true long-season Laredo soybean which is popular as a hay crop in the South. This term should indicate to the southern buyer that the seed is a variety that matures earlier than true Laredo. Seed of this variety so designated will not be considered misbranded under the interstate clause of the Federal Seed Act. If, however, this early variety is designated simply as "Indiana Laredo" or as "Laredo" it will be considered misbranded.—U. S. Dept. of Agriculture.

Seattle, Wash.—Seedsmen from California and near-by states are expected to go by boat to the annual convention of the Pacific Seedsmen's Ass'n at Seattle. Arrangements have been made to board the steamship Emma Alexander at San Francisco, leaving at 6 p. m. May 28 and arriving at Seattle at 7 a. m., May 31, the first day of the convention, which continues to June 1.

Elevators in 20 or more counties, mainly in western Minnesota, have installed treating equipment and offered to treat seed at three cents a bushel or less. The large amount of government seed being brought into these counties is the primary reason why centralized seed treating service has been established. Equipment for wholesale treatment is not expensive and the low price at which the elevator offers this service make it very attractive to farmers, says R. C. Rose, extension plant disease specialist, University Farm, St. Paul.

Hegari Sold as Sorgo

Hegari seed from Nebraska valued at 4 cents per pound has been shipped in large quantities into Kansas and delivered on sales calling for Atlas sorgo valued at 12 to 14 cents per pound.

The state board of agriculture has condemned more than 50,000 pounds in different parts of the state.

One dealer who had 20 tons en route, on learning of the misdescription, had the seed relabeled "hegari."

CRABBS REYNOLDS TAYLOR CO.

CRAWFORDSVILLE, IND.

GRAIN

Clover and Timothy Seeds

GET IN TOUCH WITH US

NOBLE BROTHERS

Wholesale Field Seeds

GIBSON CITY, ILLINOIS

Red Clover, Alsike, Alfalfa, Timothy
SOY BEANS

THE ACKERMAN COMPANY

High Grade Ohio Grown Clovers

Alsike and Soybeans

LIMA, OHIO



BUYERS AND SELLERS

All Field and Grass Seeds

Mail Samples

CORNELL SEED COMPANY

Wholesale Field and Garden Seeds

ST. LOUIS, MO.

ED. F. MANGELSDORF & BRO.

Buyers and sellers of

Sweet Clover, Alfalfa, Lespedeza, Clovers, Timothy, Grasses, Fodder, Seeds, Sudan Grass, Soy Beans, Cow Peas
St. Louis, Missouri

STOLLER'S SEED HOUSE

Wholesale Field Seeds

PAULDING, OHIO

Red Clover, Alsike, Alfalfa, Timothy
Sweet Clovers and Soy Beans

FOSTER-KENDALL CO.

Wholesale Field Seeds

CARMEL, IND.

Red Clover — Alfalfa
Alsike — Soy Beans

"Bargain" Seeds the Most Expensive

Dealers contemplating the purchase of seed stocks are warned to beware of so-called "bargain" seed which is being offered for sale by sample, by Dr. H. R. Kraybill, Indiana State Seed Commissioner. "Recently a sample of alfalfa seed submitted by a mail order seed company was analyzed by the seed laboratory and found to contain 1.7 per cent weed seed, among which were included 2,520 Russian thistle, 90 field dodder, and 90 bracted plantain in one pound of the seed. The germination of the alfalfa was only 40.5 per cent with 18.5 per cent hard seed."

New Effective Treatment for Smut

Although most field seed dealers who grow oats are familiar with the formaldehyde treatment to control smut, many are not aware of a new treatment, recently discovered, that is superior to the formaldehyde treatment in some ways, according to Dr. C. T. Gregory, extension botanist of Purdue University. It is the Ethyl Mercury Phosphate (New Improved Ceresan) treatment, which consists of an organic mercury dust that is mixed with the seed in the dry form.

Dr. Gregory outlines the procedure as follows:

The treatment consists of mixing one-half ounce of this organic mercury dust with each bushel of seed, and it is not necessary to use any particular kind of apparatus for the work, for merely shoveling the oats and dust together will be sufficient. Any sort of a closed revolving container will also do a highly effective job.

After this application the oats are covered with blankets or sacks for at least 10 hours. After this the seed may be planted at once or may be sacked and held till planting time. However, it is best not to store the treated oats longer than four weeks before planting.

This treatment not only kills the smut, but experimental evidence indicates that the treated oats will yield one or two bushels more than the untreated. This means that even though there is no smut in the crop the small increase in yield will pay the cost of treatment. In this case the farmer can insure the crop against smut and get paid for doing it.

One objection to this treatment is that the dust may be injurious to the operator if inhaled in quantities. Always wear a mask of a dampened cloth or sponge over the nose and mouth while working with this dust. Treated seed should not be fed to farm animals because of the poisonous nature of the material.

Cull Ears of Seed Corn

By BENJAMIN KOEHLER, pathologist,
University of Illinois.

Seed infections known as diplodia and fusarium were both unusually prevalent in the state last season. While these fungi cause rots and kernel discoloration, there are many infected seed ears which show no signs of infection until a germination test is made.

Certainly when seed ears are shelled this spring, it will be more important than ever to inspect the shelled grain from each ear to make sure there are no discolored kernels. Eliminating such grain will solve part of the disease problem.

The best means of control will be to cull the seed ears closely, make a germination test of every selected ear so that those which show poor vigor or disease infection can be eliminated and then treat the seed with a good disinfectant especially prepared for this purpose. Farmers who are not equipped to make a germination test and do not wish to go to the expense of having it made will still profit by carrying out the other two measures, that is, culling and seed treatment. These may be done at home.

Corn seed infections do most damage in early planted corn when germination is slow. As corn is a long-season crop it must be planted in the first half of May in most parts of Illinois in order to make the best yields and the best quality of grain. If for some reason planting must be delayed until later, then seed treatment may or may not prove of value, depending upon the season.

New Soy Varieties

Mandell and Kingwa soybeans are two prominent new varieties attracting attention of Indiana farmers this year. The Mandell is a selection from a field of Manchus made by the Purdue University Agricultural Experiment Station, which has been multiplied this year by growers. It is slightly earlier than the popular Manchu, slightly stiffer stemmed, and also higher in hay and seed production, according to K. E. Beeson, of the agronomy extension staff. Quality of seed is improved over the Manchu, and under adverse harvesting conditions this will be a distinct advantage. This variety is adapted to the same area in central northern Indiana that grows the Manchu and should become popular with growers liking that variety. The Dunfield is popular in central Indiana particularly and is very acceptable for hay or seed purposes, Beeson pointed out.

The Kingwa is a black variety of outstanding value for hay in the southern half of the state where it is earlier than the Virginia, Wilson, Sable and other black soybeans, altho at least a week later than the yellow varieties. Making hay earlier, or starting seed harvest in late September are both distinct advantages in handling soybeans, and the earlier maturing habits of the Kingwa are contributing to its rapid increase in popularity. Several thousand acres were produced for seed purposes in 1934 in the vicinity of Evansville. Its high yielding ability for seed, its heavy hay yields, and ability to hold its leaves during harvest; its rather stiff stem, and non-shattering tendencies have made a favorable impression on farmers so that it promises to become the leading black soybean for southern Indiana. It has produced more hay and seed than other black or brown varieties tested at the Purdue Experiment Station. Certified seed sources of these newer varieties are available from Purdue.

Growers intending to sell surplus seed supplies to oil mills recognize the importance of using yellow varieties that are high in protein and oil, and acceptable for milling purposes. Black seed or mixtures are usually discounted by the mills as both meal and oil are off-color.

A grain inspector's license was revoked Feb. 27 for grading as not garlicky red winter wheat containing garlic.

Redwing Flaxseed

A new variety of flaxseed that is ten days earlier is being distributed for growing tests by the University of Alberta, at Edmonton, this spring.

The variety was developed in the province by Dr. O. S. Aamodt, from a selection made in Minneapolis in 1923 by Dr. E. C. Stakman and himself.

Five-year test results, both plot and field, showed an average yield of 20½ bus., almost double the provincial average. Last year, by maturing before the early frost, it graded high.

Redwing flax is distinguished by five leading features: Early maturity, highest yielding in Edmonton, stiffest straw, most disease-resistant and highest quality for oil production.

The new variety will move the flax growing area north.

Emergency Crop Loans

Emergency crop and feed loans from the \$60,000,000 fund appropriated by Congress will be available within a week, according to an announcement today by Governor William I. Myers of the Farm Credit Administration.

Governor Myers said the emergency loans will be made only to farmers who are unable to obtain elsewhere, supplies, feed, or the necessary credit to purchase such items, and not to any applicant who can obtain credit from any other source, including production credit assn's.

As in the past, applications for emergency crop loans will be made to the country crop loan committees already set up in most counties.

Loans will be made only to applicants who are co-operating directly with the production control program of the A.A.A. or who are not proposing to increase their 1935 production in a way detrimental to the success of the program. A statement to this effect is contained in each loan application.

Governor Myers said that the maximum emergency crop loan to one farmer this year is \$500 and the minimum is \$10, but no loan for the growing or harvesting of crops may be made in an amount greater than is actually needed in each case to purchase seed and fertilizer necessary for production.

Lookout for Misbranded Seeds

Misbranded seeds continue to run afoul the Federal Seed Act. So-called "New Victory Oats" represented as being a winter variety by the Sun-Field Seed Service Co. of Chicago, and shipped from Clarinda, Iowa, to three points in Kansas—Salina, Humboldt and Baldwin—have been shown to be Victory oats, a northern spring variety. The shipment to Salina was labeled "Iowa grown" but all three shipments were grown in the Pacific Northwest.

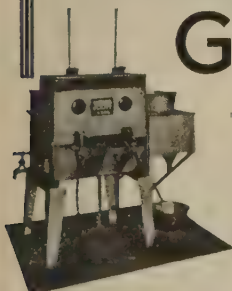
The oats were seized last fall upon recommendation of the Department of Agriculture. In tests during the past winter, by the U. S. Department of Agriculture at Washington and by the Kansas State College of Agriculture at Manhattan, they were killed by temperatures which did not damage winter oats.

The American Field Seed Co., 1929 West 43rd St., Chicago, which also is the address of the Sun-Field Seed Service, has been fined \$200 by the U. S. District Court after pleading guilty to shipping to Remington, Ind., two bags of sweet clover seed misbranded as to germination, weed seed content and inert matter.

For shipping five bags of misbranded lepedeza seed to Montgomery, Ala., Sidney J. Weber of Baton Rouge, La., was placed on probation for one year and imposition of sentence suspended by the U. S. District Court in New Orleans. The seed was sold as choice grade, best quality, Government tested. It had not been government tested and was of poor quality. It was found to have a germination test of only 3 per cent and approximately 20 per cent of hard seed.

Four bags of oats shipped by the Fidelity Seed Co., of Memphis, Tenn., to Birmingham,

HIGHER GRADE GRAIN



commands a premium.

Be assured of your grades before shipping by checking with the same equipment used in terminal markets and in the U. S. Grain Inspection Departments.

Profit Is Assured by Using Correct GRAIN GRADING EQUIPMENT

Official Brown-Duval	Sample Pans
Moisture Testers	Accessories
Scales	Weight Per Bushel
Sieves—Grain and Seed	Testers
Triers	Emerson Dockage
Mixers	Kickers

SEED TRADE REPORTING BUREAU
325 W. HURON STREET
CHICAGO ILLINOIS

Ala., were misbranded as to purity and weed seeds. The U. S. District Court in Birmingham ordered the seed delivered to a charitable institution for feed.

The Department of Agriculture cooperates with state seed inspectors in keeping close tab on seed shipments.

Grow Malting Barley for Profit

By RALPH F. CRIM, Extension Agronomist, Minnesota.

Malting barley, that extra fancy grain that maltsters pay premium prices for, cannot be produced just by accident. This fact was emphasized to farmers of southern Minnesota in a recent series of meetings. The first essential is to sow a variety of barley that the malting trade likes. For Minnesota, such varieties are Velvet, Manchuria, and Wisconsin 38.

Varieties such as Glabron and Trebi, tho good feed barleys, absolutely will not do for malting. Another essential is to have the seed free from mixtures of other grains or of non-malting varieties of barley.

In addition to requiring good, clean barley of the right variety, malting demands high, even germination. Thus to bring malting prices, barley must be practically free of smut and other diseases and the kernels must not be broken or otherwise injured so as to impair appearance and germination. This makes it very important to thresh malting barley with special care—in fact, to handle the crop very carefully and intelligently all the way thru.

To the man who succeeds in turning out the high quality demanded, the maltsters will pay a handsome margin over the regular market for feed barley.

Canus Wheat

A new variety of wheat named Canus has been originated by Dr. A. O. Aamodt, professor of genetics and plant breeding of the University of Alberta. It is a cross between the famous Canadian Marquis and Kanred, a high quality United States winter wheat. The name is a combination of the names of the two countries contributing to the strain, Canada and the United States.

Not since the well known "222" was developed by the University of Alberta has there been such interest in a new wheat and many tests to which Canus has been subjected the last few years makes it a strain of great promise. Tests made by the federal department of agriculture and the national research council thru a joint plant breeding com'te affords convincing evidence that Canus is the most promising of all new varieties of wheat.

Its principal attributes are resistance to root rot, stiffness of straw, resistance to drouth, excellent milling quality and high yield. Milling tests attest the splendid quality of the new wheat and it is probable Canus will supplant Marquis over a wide area on the western plains. It will not invade districts where early ripening is required as it takes about the same time to reach maturity as Marquis.

In co-operative tests mentioned Canus wheat showed an average yield all over western Canada of 32.4 bushels an acre. It is on this asset that this variety may outstrip Marquis as it is a considerably heavier yielder. Canus has a weakness, its lack of resistance to rust, but rust in Alberta is little known.

Canus is a bearded wheat, a heritage from winter wheat of its ancestry. Bearded wheats are the exception among western Canada's spring wheats but this should prove no liability against the newcomer. From Marquis it obtains extremely good milling and baking value. Marquis is a cross between Red Fife and an early ripening wheat from India.

It usually takes about 15 years to develop a new strain of wheat. Dr. Aamodt started his experiments in 1930. During the approaching spring small quantities of Canus will be distributed among farmers. The quantity available is limited.

Seeds Lose Viability Under Bad Storage

From germination tests on numerous lots of sorghum seed, loss of viability on the approach of the planting season seemed due to unfavorable storage conditions rather than natural shortness of life, according to J. W. Zahnley.

Very little loss in viability occurs during spring months when seed is stored in small quantities with low moisture content and kept dry.

Longevity tests showed yellow milo and feterita to lose vitality somewhat faster than sorgo, Sudan grass, kafir, or German millet. The hard seed percentage in alfalfa, sweet-clover, and Korean lespedeza decreased gradually and fairly rapidly in protected outdoor storage begun 3 mo. after harvest and continued 18 mo., whereas in a heated room the decrease was slower in alfalfa, practically nil in sweet-clover, and the rate did not differ appreciably from outdoor storage with lespedeza seed.—Biennial Report Kansas State Board of Agriculture.

Benefits of Futures Markets

By H. CLYDE FILLEY, professor of rural economics, University of Nebraska.

When new wheat comes on the market at threshing time, flour mills buy to supply their immediate needs. Few mills can buy and store at harvest time any very considerable part of a year's supply. No conservative miller would wish to buy a year's supply of wheat in the summer unless he was able to pass on to someone else the risk of loss due to a fall in price. If no one except flour millers were willing to buy wheat when it is being rushed to market the price would drop because of the small demand.

One of the big services of the future market is that it serves as a price barometer. Because sales of wheat are made for future delivery, every one knows what the best posted men in the grain trade think wheat will be worth in July or September or December. As a matter of course, the futures price influences the cash and the cash price influences the future price.

Let us suppose that wheat from northern Texas, Oklahoma and western Kansas is being rushed to market in early July. It is being shipped faster than it can be milled or than mills are willing to buy it. Under such conditions the price would fall rapidly if there were no other buyers to sustain the market. But future traders have secured definite information that the spring wheat crop in the northern states and in western Canada has been injured by drouth. They believe that less wheat will be available for market than usual during the autumn and winter. They are willing to pay a price for wheat to be delivered in September or December, based on the probable supply of wheat available at that time instead of on the wheat that is being rushed to market at the present time.

If at any time the price of cash wheat drops until it is below the price of futures wheat by more than the cost of holding, storage concerns are always ready to buy the cash wheat and sell it at once for future delivery. This sustains the cash market.

The cash market influences the futures market. If the cash market at any time becomes either better or worse than future traders anticipated, they find it necessary to revise their estimates, and this brings future prices in line with cash prices.

The seasonal variation in the price of wheat, oats and corn is much smaller than the seasonal variation in the amount marketed.

New restrictions on private wires in the proposed code of the communications corporations would raise the expenses of brokerage firms, Frank R. Hope, pres. of the Ass'n of Stock Exchange Firms, told the federal communications commission recently.

Supply Trade

F. L. Morse, pres. Morse Chain Co. and director of Borg-Warner Co. died of bronchial pneumonia at his winter home in Florida, Mar. 25.

Mishawaka, Ind.—The plan for reorganizing the Dodge Mfg. Co. was approved Mar. 9 by the U. S. District Court. All creditors, bondholders and stockholders surrendering their evidences of indebtedness to the new corporation may obtain securities of the new corporation on or after Apr. 5.

Red Wing, Minn.—The new grain storage addition to the plant of the Fleischmann Malting Co. described in the Mar. 13 Journals, is completely equipped with the Zeleny Thermometer System which enables the operators to determine the temperature of the grain in each bin at any time.

Alma, Mich.—The Crippen Mfg. Co. has placed two new machines on the market; one a bean and seed polisher the other a separator. It is claimed this separator is ideal for cleaning off-grade lots, and for taking out sorrel, buckhorn, ragweed, thistle and other foreign seed from grass seed.

Muncy, Pa.—In the receivership of the Robinson Mfg. Co., the U. S. District Court has ordered a hearing Mar. 30 at Williamsport on the offer of \$30,000 by John H. Ball and Warren D. Foster for the assets, to which offer an objection has been filed by several stockholders as inadequate.

Schenectady, N. Y.—The 43d annual report of General Electric Co. for the year 1934, shows profit available for dividends of \$19,726,044, equivalent, after \$2,575,074 of regular 6% cash dividends on the special stock, to 59c a share on 27,845,927 shares of no par value common stock, compared with \$13,429,739, or 38c a share on the same number of shares in 1933. Orders received amounted to \$183,660,303 during 1934, compared with \$142,770,791 during 1933, an increase of 29%. Sales billed amounted to \$164,797,317 during 1934, compared with \$136,637,268 during 1933, an increase of 21%. The orders received exceeded the shipments by a substantial amount, so that unfilled orders were greater at the end than at the beginning of the year.

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Feedstuffs

Indianapolis, Ind.—The bill making it mandatory to state formulas of mixed feed has been killed in committee.

Minneapolis, Minn.—Minneapolis received 3,617 and shipped 4,012 tons of screenings during February, against 1,495 tons received and 3,361 tons shipped in February, 1934.

Tags listing ingredients in the order in which they preponderate in a feed mixture are desired by poultrymen of Florida, who have asked the state department of agriculture for a regulation requiring this to be done without disclosing the exact formula of the manufacturer.

Salt licks placed before sheep poisoned many flocks of sheep in west Texas the past year. The Texas Agriculture Exp. Station finds that the deaths were due to copper in the salt mixture. This chronic copper poisoning results from the continued ingestion of very small amounts of copper sulphate.

Side Line Assessments

The Farmers Elevator Ass'n of Minnesota points out that in paying 1935 code assessments under Order X-131 country elevators are subject to assessment on the total dollar volume of the entire retail business if such total exceeds \$10,000 during the 12 month period for which assessment is made.

Feed is wholesale inasmuch as it does not reach the ultimate consumer when sold for feeding purpose, going into products later sold at retail.

Duty on Feed Wheat

The department of agriculture and the treasury department have agreed upon the basis for the importation of low grade wheat into the United States for feed.

It was announced Mar. 18 that instructions have been sent to collectors of customs to admit wheat containing 30 per cent or more by weight of damaged kernels at the rate of 10 per cent ad valorem.

The department of agriculture stated its opinion that it is not commercially practicable to mill wheat containing more than 30 per cent of damaged kernels, nor to blend it except in a minor proportion.

Peanut Oil Cake

Peanut oil cake, the residue after the oil has been pressed out, contains 40 to 50 per cent of protein. Experiments have shown that peanut proteins are not only highly digestible but that they rank among the highest in quality, containing all the known essential amino acids. Feeding tests have demonstrated the nutritive value of peanut proteins when used in a grain ration, and are nearly if not quite equal to the proteins of milk, meat, and eggs. Peanuts can be substituted for nuts where the latter are not easily obtained or are high in price. A highly digestible and palatable bread can be made from a mixture of wheat and peanut flour.

Peanut vines make a good quality of hay, containing 10 to 12 per cent of protein. The feeding value of peanut hay compares favorably with that of alfalfa and other leguminous hays. Peanut cake is a good source of protein for livestock rations. Hogs relish peanuts, which, however, should be fed only in moderate amounts to avoid soft pork. The nuts of the small-podded varieties make good poultry feed. It is said that turkeys fattened on peanuts yield

a better-flavored and tenderer meat than turkeys fattened on corn or other grain feeds.—Texas Exp. Sta.

State Feed Mixing at a Loss

The Missouri relief and reconstruction commission is reported to be having difficulty in distributing the product of its four feed mixing plants.

Corn fodder was purchased and protein concentrates and molasses were added. Now some of the feed has gone moldy. Some heated, causing two fires at Clinton, Mo. The selling price of the mixture is less than what it cost.

As operation of the feed mixing plants was for an emergency the equipment of the four plants probably will have to be sold at a loss, and it would be to the advantage of the feeders and reduce losses to taxpayers if the commission would sell the mixing plants and get out of the business.

Commercial Feedstuffs in Massachusetts

BY PHILIP H. SMITH

Of the 1,641 samples of feeding stuffs collected in Massachusetts during the year ending Sept. 1, 1934, only 96, or 5.9 per cent, were found to be one per cent or more below their protein and fat guaranty or more than one per cent over the guaranty for fiber and in no case to such an extent as to materially affect their feeding value.

Especially attention should be called to feeding oatmeal, a by-product which finds considerable favor as a food for poultry. In most instances the samples of Alpine feeding oatmeal collected carried from 20 to 30 per cent of cereal other than oats and one shipment was found to contain so much white corn meal that it was subjected to seizure by the federal authorities. It is quite possible that this admixture of other cereal was not, with the exception of the added corn in one instance, a direct attempt at adulteration but rather due to the fact that oats which had not been properly separated from other cereals, dirt, and chaff were hulled and the resulting material ground and sold as feeding oatmeal.

Several samples of ground oats showed an exceptionally high fiber content. These were shipped by Farmers' Service Buro and Hood Mills Co., of Baltimore, Md., both subsidiary companies of Frederick Obrecht & Son of that city. Three samples contained 15.64, 16.20 and 15.15 per cent of fiber. Other samples collected from this source were more nearly normal in fiber content. The average fiber content of 61 samples of ground oats collected during the year was 11 per cent. While it is possible to find oats which carry as high a fiber content as

Feed Future Prices

The following table shows the closing bid price each week in dollars per ton for standard bran and gray shorts for June delivery:

		St. Louis	Kansas City
		Bran	Bran
		Shorts	Shorts
Feb. 2	21.60	26.15	19.90
Feb. 9	22.25	25.50	20.50
Feb. 16	21.75	25.75	19.75
Feb. 23	21.00	25.00	19.75
Mar. 9	20.00	22.15	18.50
Mar. 2	21.30	24.75	19.75
Mar. 16	19.25	22.40	17.50
Mar. 23	19.50	22.90	18.75

the samples in question, they must be considered as inferior in feeding value.

A number of samples of ground oats showed a liberal admixture of barley and wheat. While federal standards allow for an admixture of other cereals in certain grades, the mere grinding of "barley mixed oats" does not change the product into "pure ground oats." The quality and grade of whole oats can be determined in a general way by their appearance, which cannot be done when they are finely ground. In justice to the purchaser ground oats should be identified by a tag showing the grade of oats from which they are ground.

Wheat Processing Taxes collected up to Feb. 1 amounted to \$192,262,806.78. Payments of benefits have amounted to \$91,875,579 on the 1933 program and \$63,382,738 on the 1934 program. All processing taxes collected totaled \$690,728,712, and disbursements \$585,921,945. It was not supposed that any of the processing taxes were instituted for the purposes of raising revenue.

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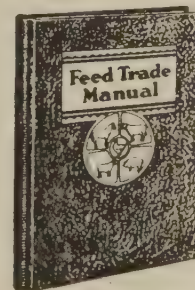
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Calculating Poultry Rations

By GUSTAVE F. HEUSER, of Cornell University

[Local conditions as to supply, and market conditions as to costs of ingredients, make it practically impossible to copy a formula. To change a formula to obtain the most feed value for the least cost, or to calculate a new formula it is necessary to understand the following principles.—Ed.]

The ration should be correctly proportioned in regard to the different groups of feeds. Where equal parts of grain and mash are to be fed, a symmetrical ration for egg production might be as follows, in percentage:

Grain, at least two kinds.....	40
Ground feeds, at least four kinds.....	30
Animal-protein feeds, at least one kind.....	10
Green feeds.....	15
Mineral feeds, grit and shell.....	5

It is desirable that the mash mixture contain five or more ingredients, one being a source of animal protein. The grain mixture should contain at least two grains. Oats, buckwheat, and other grains high in fiber should not make up more than 30 per cent of the grain mixture.

Effect on quality of product.—The hen submits all feeds to a high refining process so that the characteristics of the feeds themselves do not have much effect upon the product. Some feeds, however, do have an effect upon the flavor, the odor, or the color. Green legumes, kale, sprouted oats, and yellow corn will give a deep yellow color to the yolk of the eggs, whereas wheat, oats, buckwheat, white corn, and beets tend to give a light color to the yolk. As far as taste is concerned, rape, fish scrap, and sometimes cabbage, if fed in too large quantities, may slightly affect the flavor of eggs. However, cabbage that is in good condition can be fed liberally without much danger to the quality of eggs. Onions, even in small amounts, are likely to injure the flavor of flesh and eggs. Cod-liver oil might affect the flavor of the flesh and should not be fed a week or two before marketing the poultry.

Protein-energy ratio is the relation of the amount of protein (the tissue-building material) in the feed, or group of feeds, to the combined amount of carbohydrates and fat. A balanced feed is one that has a correct protein-energy ratio; that is, enough of the various nutrients necessary for the particular purpose without having any excess to go to waste. For egg production a ratio of from 1 to 4.5 to 1 to 5.5 is desirable.

The value of the feeds should be computed on the amount of available nutrients, for it is the digestible part that is of any use to the bird; it is the digestible part that becomes available and is made into eggs or flesh. Thus large amounts of fibrous feeds must be avoided. It must be borne in mind, however, that the feed in question may be rendered more or less valuable than indicated by its total digestible nutrient by such other factors as the nature of the feed, the quality of the nutrients, palatability, and fiber content. For example, even if oats are found to be cheapest, the amount used in the scratch grain mixture must be limited on account of the bulk.

Standard feeding requirements.—The same detailed standards of requirements for poultry that have been worked out for other animals are not yet available. Dr. Wheeler of the New York State Agricultural Experiment Station gives the following:

Five hundred pounds of fowl (100 hens weighing 5 pounds each) will need each day: dry matter 27.5 pounds, ash 1.5 pounds, protein 5.0 pounds, carbohydrates 18.75 pounds, fat 1.75 pounds. In this mixture the nutritive ratio is 1 to 4.54.

As a result of the study of several successful rations for egg production, it seems probable that the requirements for laying hens, stated on a percentage basis of the total food consumed, fall within the range: fiber 3.5 to 5 per cent,

protein 15 to 16 per cent, protein-energy ratio 1 to 4.5 to 1 to 5.5.

Composition of feeds.—Before taking up the method of working out a ration, one needs to be familiar with the composition of feeds. The average composition for the more common poultry feeds is given in the table. The fiber is practically undigested by poultry but is given in order that the amount in the different feeds may be compared and the total amount in the ration kept within the limits as stated in the requirements.

Average Composition of Common Poultry Feeds, 100 Pounds*

Feeds.	Ash		Fiber		Protein		Fats		Nitrogen-free extract	
	Pct.	Pct.	Pct.	Pct.	Pct.	Pct.	Pct.	Pct.	Pct.	Pct.
Corn and cornmeal..	1.5	2.0	9.9	4.9	69.7					
Hominy feed	2.6	4.4	10.6	8.0	64.3					
Corn gluten feed.....	2.1	7.1	25.4	3.8	52.9					
Corn gluten meal....	1.3	3.1	44.4	2.9	38.9					
Wheat	1.9	2.2	12.4	2.1	71.2					
Wheat bran	6.3	9.5	16.0	4.4	53.7					
Wheat middlings, standard	4.4	6.0	17.4	4.9	56.8					
Wheat middlings, flour	3.7	4.7	17.8	5.0	58.1					
Red dog flour.....	2.5	2.2	16.8	4.1	63.3					
Oats	3.5	10.9	12.4	4.4	59.6					
Oats, hulled	2.2	1.4	14.3	8.1	67.1					
Barley	2.7	4.6	11.5	2.1	69.8					
Buckwheat	2.1	10.3	10.8	2.5	62.2					
Buckwheat middlings..	4.8	4.8	28.3	7.4	42.7					
Kafir corn	1.7	2.3	11.1	3.0	70.1					
Peas	3.4	5.6	22.9	1.1	57.8					
Sunflower seeds	3.1	27.9	16.1	24.7	21.3					
Linseed oil meal.....	5.4	8.4	33.9	7.5	35.7					
Soybean oil meal.....	4.9	5.3	43.2	6.6	29.5					
Buttermilk	0.7	..	3.6	0.1	5.0					
Dried buttermilk	8.1	..	34.6	1.9	50.9					
Dried blood	3.3	..	82.3	0.9	3.8					
Fish meal	28.1	..	51.4	8.3	..					
Tankage, 50 to 60%	18.4	6.6	51.7	10.4	3.9					
Meat scrap*	25.1	..	56.0	9.4	..					
Fresh bone	21.1	..	19.7	25.0	3.8					
Bone meal	61.7	..	24.3	3.1	3.6					
Alfalfa meal	9.0	30.1	14.3	2.0	35.8					
Alfalfa leaves	13.6	12.7	22.5	3.4	41.2					
Green alfalfa	2.4	7.0	4.5	1.0	10.4					

*The analyses, except those for the meat scrap, are taken from the 1928 edition of Feeds and Feeding, by Henry and Morrison.

Computing rations for egg production.—As an example in computing a ration, the following mixture may be used:

Grain, lbs., 100 cracked corn, 100 wheat. Dry mash, lbs., 100 cornmeal, 100 wheat bran, 100 flour wheat middlings, 100 ground heavy oats, 75 meat scrap (55 per cent protein), 25 dried milk.

One hundred pounds of corn contains 2 pounds of fiber, 9.9 pounds of protein, 4.9 pounds of fat, and 69.7 pounds of nitrogen-free extract (table 3).

To determine the composition for the other feeds in both the grain and mash mixtures, the amounts of fiber, protein, fat, and nitrogen-free extracts in the table are used as a basis. From these it is found; therefore, that the mixtures will contain the relative proportions of fiber, protein, fat, and nitrogen-free extract indicated in the following tabular statements:

Grain Mixture					Nitrogen-free	
	Fiber	Protein	Fat	extract		
100 lbs. corn.....	2.0	9.9	4.9	69.7		
100 lbs. wheat.....	2.2	12.4	2.1	71.2		
200 lbs. grain mixture	4.2	22.3	7.0	140.9		
100 lbs. grain mixture	2.1	11.2	3.5	70.5		

Mash Mixture					Nitrogen-free	
	Fiber	Protein	Fat	extract		
100 lbs. cornmeal....	2.0	9.9	4.9	69.7		
100 lbs. wheat bran..	9.5	16.0	4.4	53.7		
100 lbs. wheat midds..	4.7	17.8	5.0	58.1		
100 lbs. ground oats..	10.9	12.4	4.4	59.6		
75 lbs. meat scrap....	..	42.0	7.1	..		
25 lbs. dried milk....	..	8.7	0.5	12.7		
500 lbs. mash mixture	27.1	106.9	26.3	253.8		
100 lbs. mash mixture	5.4	21.4	5.3	50.8		

By adding the amounts of nutrients in the various feeds, it is found that 200 pounds of the grain mixture contains 4.2 pounds of fiber,

22.3 pounds of protein, 7.0 pounds of fat, and 140.9 pounds of nitrogen-free extract; by dividing these figures by 2, the respective amounts for 100 pounds of grain mixture are 2.1, 11.2, 3.5, and 70.5 pounds.

By adding the amount of nutrients in the various feeds in the mash mixture, it is found that in 500 pounds of the mixture there are 27.1 pounds of fiber, 106.8 pounds of protein, 26.3 pounds of fat, and 253.8 pounds of nitrogen-free extract; or in 100 pounds of the mixture, the amounts are 5.4, 21.4, 5.3, and 50.8 pounds respectively.

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ration, the hens should eat about equal parts of grain and mash. Where hoppers are left open only during the afternoon, the hens will eat about 2 pounds of grain to every 1 pound of mash. Therefore, in order to get the correct protein-energy ratio, it must be computed on the basis of 200 pounds of grain and 100 pounds of mash.

The nutrients found in 200 pounds of grain must be added to those found in 100 pounds of mash, and the total divided by 3 in order that the nutrients in 100 pounds of the ration may be determined. If the ration is fed in the proportion of three parts of grain to two parts of mash, the nutrients in the 300 pounds of grain must be added to the nutrients in the 200 pounds of mash and the sum divided by 5 that the nutrients in 100 pounds of the ration may be obtained.

The nutrients for the ration given may be calculated as follows:

	Fiber	Protein	Nitrogen-free Fat	extract
100 lbs. grain.....	2.1	11.2	3.5	70.5
100 lbs. mash.....	5.4	21.4	5.3	50.8
200 lbs. ration.....	7.5	32.6	8.8	121.3
100 lbs. ration.....	3.8	16.3	4.4	60.7

This ration, then, has 3.8 pounds of fiber, 16.3 pounds of protein, 4.4 pounds of fat, and 60.7 pounds of nitrogen-free extract, for every 100 pounds of feed.

Rule for computing protein-energy ratio.—Add the fat (4.4) multiplied by $\frac{2}{3}$ (9.9) to the nitrogen-free extract (60.7), which gives the total energy nutrients (70.6). Total energy nutrients (70.6) divided by protein (16.3) equals protein-energy ratio (4.33). Therefore the protein-energy ratio of this ration is 1:4.33, which means that for each pound of protein the ration contains the equivalent of 4.33 pounds of energy nutrients (carbohydrates and fat).

In this way rations may be made up to meet economic conditions in any particular locality. In balancing a ration, proportions of available feeds should be used as seem desirable. Then the nutrients should be calculated as explained. If it is found that the protein-energy ratio is too wide (containing too large an amount of carbohydrates and fat to one part of protein), the amount of one or more feeds that contain a large proportion of carbohydrates and fat should be reduced and one or more feeds that contain a larger proportion of protein should be substituted. If it is found that the protein-energy ratio is too narrow (containing too small an amount of carbohydrates and fat to one part of protein), the amount of one or more feeds that contain a large proportion of protein should be reduced and one or more feeds that contain a larger proportion of carbohydrates and fat should be substituted. After a few such trials, it should be possible to formulate a ration that will meet the requirements. One must not forget palatability and mechanical condition.

Turkey Chat

By H. E. COSBY

Extension Poultryman, Oregon State College.

Economic conditions enabled the efficient turkey grower to realize in 1934 a small margin of profit. A keen interest is already shown in regard to production operations for 1935. Confronted with increased feed costs, a flood of requests has been received from mills, dealers and growers asking for new or revised feed formulas and information on management of breeding stock.

Feed alone does not assure success. There are many excellent commercial turkey breeding, starter and developing feeds on the market with which growers have had fine results.

There are many operators who have been successful in the use of home mixed rations or having the local mill mix the ingredients asked for.

In any event the mash formula should be sufficiently elastic to meet from year to year the varying price levels of its ingredients. Good feed should be considered an investment rather than an expense. Proper nutrition is only one very important link in the strong chain of turkey management. Too often a good feed is condemned for poor results attained when some management factor was faulty.

BREEDING SEASON HINTS

First: Breeders should be selected in the early fall. Those chosen should be separated from the market band. They should not go through two or three fattening periods with the market flock. Fattened breeders do not produce the best hatching eggs. The hens are more easily torn by the toms.

Second: A large flock mating should have access to a range which provides hiding places for more seclusive matings, without interference from other toms. Feed troughs should be distributed over a wide area to prevent too much concentration of contamination.

Third: Harem matings (one tom to 10-12 hens) should not be made in adjoining pens unless the partition fence is boarded up to obscure vision from one yard to the other. Toms spend too much time fighting through the fence; breeders show preferences, and fertility is sacrificed.

Fourth: Extra toms should be held over for emergency replacements and to alternate with the toms used in the regular matings. The toms thus removed should be fed liberally for a few days and put back to replace the others to be treated the same way.

Fifth: Turkey eggs saved for hatching should be held at a temperature from 40 to 60 degrees. An egg case equipped with special fillers provides a safe storage place, and tilting the case daily makes turning much easier.

Sixth: Eggs held for hatching should not, for best results, be held longer than 14 days, under average conditions.

Seventh: A turkey egg that weighs less than $2\frac{3}{4}$ ounces is not often a desirable hatching egg. One that weighs much in excess of $3\frac{1}{2}$ ounces is all too often double yolked and an economic waste.

Eighth: In the feeding and breeding program it must be remembered that the hen "manufactures" the egg only when she is supplied with the right materials. She can't "create" an egg from a handful of grain. If the range doesn't supply her needs (and it rarely does) the owner has to do it. The egg can only hatch what has been fed and bred into it.

Breeder turkeys should have access, on or be-

fore January first, to a well-balanced breeder's mash; grain, dry and succulent greens; hard grit and oyster shell. It is the practice of many to also provide hoppers of granulated bone and charcoal.

MASH FORMULA REFERENCES

	Breeder Lbs.	Starter Lbs.	Developer Lbs.
Bran	360	300	360
Ground corn	300	400	300
Ground barley	100	0	100
Ground whole oats.....	200	100*	200
Ground wheat	400	450	400
Fish meal	150	200	150
Meat scraps	100	200	150
Powdered milk	100	100	100
Dehydrated alfalfa	160	160	150
Steamed bone meal	60	30	30
Oyster shell flour	50	40	40
Fine salt	20	20	20
	2,000	2,000	2,000

*Finely ground.

1. From 5 to 10 pounds of fortified cod liver oil, or its equivalent, should be added to the breeder and starter mashes. At least 5 pounds should be added to the developing mash throughout the growing season, unless exceptional conditions of weather and range exist.

2. The mash formulas given here are quite similar throughout. Untold combinations; additions; reductions and eliminations might be made according to opinions. These uniform mashes have been used with gratifying results.

3. Farms that provide liquid milk in ample amounts could eliminate the powdered milk, adding the poundage thus removed to the ground grains, or by using a much more simple mash entirely.

4. Farms that have an abundance of succulent green feed throughout, could reduce mash costs by removing 100 pounds of the purchased dehydrated greens.

5. Corn is higher in price than the other

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grains used. It is, therefore, used in lesser quantity until its cost is more in line.

6. A uniform, coarsely ground mash is more palatable than the same ingredients ground into a powder. A reasonably coarse mash is less likely to generate feather eating, beak wiping and similar cannibalistic vices.

Green Alfalfa Ignites Spontaneously

By L. P. DENDEL

A plan to keep alfalfa hay green and palatable, and preserve its vitamin content and the small leaves that usually drop off in handling after curing, caused the Michigan State College to put up three experimental stacks of chopped green alfalfa hay in an East Lansing field; one 12 feet in diameter, one 10 feet in diameter, and one 14 feet in diameter, with a two foot square vertical core in the center of the stack. All stacks were about 14 feet high.

The hay was stacked the last week in June, 1934. Pipes were driven laterally into the center of the stacks at various levels, so that thermometers could be inserted to record temperatures at intervals. All three stacks showed gradual increase of temperature to about 110 degrees Fahrenheit. In about six weeks the temperature in the twelve foot stack rose higher than the limit of the thermometers. Before new thermometers with a higher range were obtained the stack took fire. The temperature was estimated at 250 to 270 degrees. The rise in temperature was rapid in the last two days before fire started.

This stack of chopped green alfalfa hay contained not over 27% moisture. It was covered with water-proof paper to prevent additional moisture from entering. Alfalfa in the bottom half of the stack was cut in one inch lengths, top half was cut in one-half inch lengths. The first evidence of fire was smoke curling from the top of the stack early in the morning. Several hours later fire broke out in a twelve inch area halfway up the side of the stack, and the wooden slats of the snow fence used as a container began to burn before water could be brought to extinguish the fire. A second fire started several hours later in a small spot at the same level about five feet from the location of the first fire.

The stack was watched for about three weeks and several fires on the outside of the stack originating from the two hot spots were extinguished. When the stack was torn down, the entire center was found to be charred.

A week after the fire started, a section one

foot square was cut down from the top along the side. When cut open the hay was only comfortably warm to the hand, but inside of two hours this hay had taken fire. The two bushels or so of hay removed was put on a paper on the ground and the ends folded up and fastened to prevent the hay from blowing away. The next morning this hay was found to be on fire. At about this time instructions were given to douse the stack with water to put out all of the fire. Within two days fire broke out again.

It is evident that high moisture hay may be stored safely only in small stacks, or in stacks with a ventilating core at the center.

Corn-Hog contracts for 1935 have been signed by 675,000 farmers, it is claimed by C. R. Wickard, new chief of the A.A.A. corn-hog section. Signers last year totaled 1,155,000.

Comparative Feeding Test of Soybean Oilmeals

The University of Minnesota Agricultural Experiment Station fed three lots of pigs from June 5 to Sept. 25, 1934, one lot receiving tankage, one lot soybean oilmeal made by the expeller process and the third lot receiving soybean oilmeal made by the new solvent process of extracting the oil.

The shelled corn in the ration was self-fed; so also was the protein and mineral mixture. Lot one received 85% tankage, 10% alfalfa meal and 5% mineral mixture. Lots 2 and 3 received the 10% alfalfa and 15% mineral mixture, but instead of 85% tankage were fed 75% of expeller oilmeal for lot 2 and 75% solvent oilmeal for lot 3. Following are the tabulated results of the 112 days' feeding:

	Lot 1 Tankage	Lot 2 Expeller	Lot 3 Solvent
AVERAGE PER PIG			
Initial weight	41.71	42.95	42.46
Final weight	190.21	139.70	185.42
Daily gain, lb.....	1.33	.86	1.28
DAILY RATION PER PIG, LB.			
Shelled corn	3.68	2.60	3.54
Tankage .....	.58	....	....
Soybean oilmeal .....	....	.69	.57
Alfalfa meal .....	.07	.09	.08
Mineral mixture .....	.034	.14	.11
FEEDS FOR 100 LBS. GAIN, LB.			
Shelled corn	277.86	300.89	277.31
Tankage	43.57	....	....
Soybean oilmeal .....	....	79.50	44.81
Alfalfa meal	5.13	10.60	5.97
Mineral mixture	2.56	15.90	8.96
FOR 100 LBS. GAIN			
Pounds fed	329.12	406.89	337.05
Feed cost	\$4.14	\$5.16	\$4.09



Spontaneous Combustion in Stack of Chopped Alfalfa Hay at Michigan State College.

Sunlight and Cod Liver Oil Prevent Rickets in Swine

Summarizing studies of rickets in swine Loeffel, Thalman, Olson and Olson, University of Nebraska, said:

TRIAL 1. Direct sunlight and 1 per cent of cod liver oil added to the basal ration prevented rickets in pigs fed a vitamin D deficient ration. The same antirachitic substance induced healing in pigs suffering from severe rickets.

TRIAL 2. Direct sunlight prevented rickets in pigs fed a ration deficient in vitamin D, while another group of similar pigs on the same ration, but denied exposure to direct sunlight, developed severe rickets.

TRIAL 3. Cod liver oil fed at the rate of .75 per cent of the basal mixture did not prevent mild rickets in pigs fed indoors on a ration deficient in vitamin D. When the cod liver oil was increased to 1 per cent of the basal mixture recovery of those pigs already affected took place and further trouble from rickets was prevented. Severe rickets developed in another group of similar pigs receiving the same ration but denied both direct sunlight and cod liver oil.

Dairy Cows Require Vitamin A

In Texas Station experiments with dairy cows to discover their vitamin A requirements G. S. Fraps, O. C. Copeland and Ray Treichler learned that the experimental animals required 11 units of vitamin A over maintenance in the feed to produce one unit in the butter.

Since one unit of vitamin A in eggs requires 4 to 6 units over maintenance in the feed for hens, while one unit in the butter of cows requires approximately 11 units in the feed over maintenance, it is evident that the cow utilizes vitamin A less efficiently than the hen.

The feed of the cow must be high in vitamin A for the animal to produce butter fat high in vitamin A. Unless the feed is very high in vitamin A, the butter will decrease in vitamin A potency during the course of the lactation period.

From 6 to 7 pounds of yellow corn, containing 6 to 2.5 units of vitamin A per gram and 6 pounds of heat-dried alfalfa, containing about 25 to 40 biological units per gram, did not supply sufficient to maintain a high vitamin A potency of butter.

The quantities of vitamin A in hays and fodders have not been estimated, but ordinary alfalfa meal may contain 7 to 20 units per gram. A sample of sorghum silage contained only 5 units per gram. The vitamin A of grasses seems to sharply decrease during curing. It is improbable that other hays would contain more vitamin A than alfalfa. Corn fodder or various straws, would be much lower in vitamin A than alfalfa. Commercial alfalfa hay ordinarily will contain much less vitamin A than the heat-dried alfalfa meal used in these experiments. Since both the alfalfa meal and the yellow corn were fed in liberal amounts, it is safe to say that the rations ordinarily fed dairy cows would not maintain the vitamin A potency of the butter, unless supplemented by green growing grasses or good pasture.

The vitamin A potency of butter fat decreased during the experimental period. With a cow receiving 17,000 units in 6 to 7 pounds daily of yellow corn, the vitamin A in the butter decreased from 38 rat units per gram at the beginning of the test to 16 units in 4 weeks and 5 units at the end of 5 months. With a cow receiving 7 pounds of corn and 6 pounds of heat-dried alfalfa meal, supplying 116,000 units daily, it decreased from 33 units per gram at the beginning of the test to 20 units in 4 weeks, and 12 units in 8 weeks, after which it remained at 11 to 12 units for about 5 months.

When a cow is on a feed containing insufficient vitamin A, the vitamin A potency of the butter will depend upon the length of time the

ration has been fed as well as the potency of the ration.

Feeding 116,000 units of vitamin A per day to the cow was not sufficient to maintain the vitamin content of butter fat. This number of units is probably greater than that ordinarily supplied in hays and fodders.

When two cows producing butter fat containing 1 to 5 units of vitamin A per gram, respectively, were placed on pasture, the vitamin A content of the butter increased to 35 units and 25 units, respectively, within two weeks. The cows were able to utilize the vitamin A and carotene of the pasture grass sufficiently to produce butter fat high in vitamin A activity even towards the end of the lactation period.

Toledo's New Alfalfa Mill

In its program of expansion the Pecos Valley Alfalfa Mill Co. recently completed a new alfalfa mill on a 10-acre tract adjoining the W. & L. E. R. R. right of way, a short distance from Toledo, O.

The new properties include an office building, a sacked product warehouse, a hay warehouse and a mill building, all connected with conveyors to reduce handling costs in putting hay thru the mill and into the shipping warehouse ready for shipment.

The hay warehouse is 70x200 ft., of frame construction, covered with iron and has room for 2,000 tons of baled alfalfa hay.

The three-story mill building is 40x50 ft. and 55 ft. high. Adjoining it is a 40x150 ft. receiving and conveyor shed. Machinery in the mill includes two 30 inch super hammer mills, each driven by a direct-connected 200 h.p. Fairbanks-Morse motor. Rotex sifters grade the mill and four Eureka Mogul packers put it in sacks. Screw and pneumatic conveyors handle the meal after grinding. The hammer mills have capacity for grinding 75 tons of alfalfa meal in a 24 hour run.

The meal and shipping warehouse is 70x160 ft., single story, frame, iron-clad. It will hold as much as 3,600 tons of sacked meal. Space is utilized to complete advantage thru the use of bag pilers.

Incoming hay is received over a 20-ton Fairbanks truck scale with 34 ft. platform.

The new plant was built under supervision of Jack Wilson, construction superintendent for the company, and is under the local management of E. A. Jeffery. This quarter-century old company, headed by Roy Lochhead, at Hagerman, N. M., also operates mills at Hagerman, N. M., Chandler, Ariz., Rupert, Ida., and Pauls Valley, Okla.

Two Dairy Mixtures

By H. A. HOPPER of Cornell

Since several of the high-protein feeds furnish total digestible nutrients as cheaply as low-protein feeds, it is possible where all ingredients are purchased to get a high-protein mixture at about the same cost as a low. In buying either ready-mixed feeds or separate ingredients keep your eye on the cost of total digestible nutrients making such adjustments in protein as your roughage and succulence indicates.

A highly recommended formula where all ingredients are purchased can be made as follows: 600 hominy or corn, 400 gluten feed, 300 wheat bran, 300 dried distillers' grains, 300 middlings, 100 soybean oil meal. This contains about 20 per cent protein and is high in total digestible nutrients (1554 lbs. to the ton). This mixture would be suitable with silage and second quality mixed hay low in clover, or high quality early cut timothy.

An 18 per cent mixture equally good in total digestible nutrients can be obtained from 400 hominy or corn, 100 oats, 100 bran, 300 gluten feed, 100 linseed meal. When all ingredients are purchased this will cost about as much as the mixture mentioned above. If you have your own oats and barley or corn it will be cheaper. In that case, use oats in place of bran, and barley in place of 200 of hominy or corn.

When grain prices are high there is a disposition to feed less. Grain must become relatively very high as compared with milk to make it advisable to reduce the amount customarily fed to good cows. Grain can still be fed to the better cows to advantage.

A marked reduction in concentrates will greatly reduce the amount of nutrients available for milk production and the production will drop. A small cut in grain may be offset by increasing the consumption of first-class hay. Certain substitutions or reasonable changes in grain mixtures can be made without resulting in any difference in production, providing the requirement for total digestible nutrients and the requirement for minimum protein are at all times met. Since these could not be supplied for any reasonable level of production if grain feeding were sharply reduced, the result would be less milk. Some cows are too far advanced in lactation to justify grain. Others are not worth carrying along even on hay.

Keep the better producing cows well supplied with the required amounts of total digestible nutrients containing the needed protein. If they can handle grain at the customary ratios of 1 to 3 or 1 to 3½, they will be making a good return on the concentrates fed.

Sunlight and Minerals in Pig Feeding

By E. J. SHEEHY, Dublin University

The incidence of rickets in pigs under practical farming conditions is greatest in winter and spring when the sunlight is weakest, and it is therefore highly important, when no other source of vitamin D is available to supply abundance of direct light to the pig. The intensity of ultra-violet radiation, which is the potent agent in this connection is, in these latitudes, from six to eight times greater in midsummer than in winter, and housing accommodation which, from the standpoint of light, is suitable in summer may be unsuitable in winter. Under practical conditions exposure to sunlight or the addition of cod liver oil to the ration is the most economical method for supplying vitamin D.

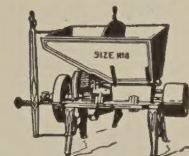
While minerals and vitamins cannot replace one another in the diet, there is a close relationship between calcium and vitamin D. When vitamin D is deficient the trouble caused may, to some extent, be rectified by an abundant supply of calcium salts and there is evidence that the minimum quantity of vitamin D which

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(ILLUSTRATED)

By W. A. Henry and F. B. Morrison

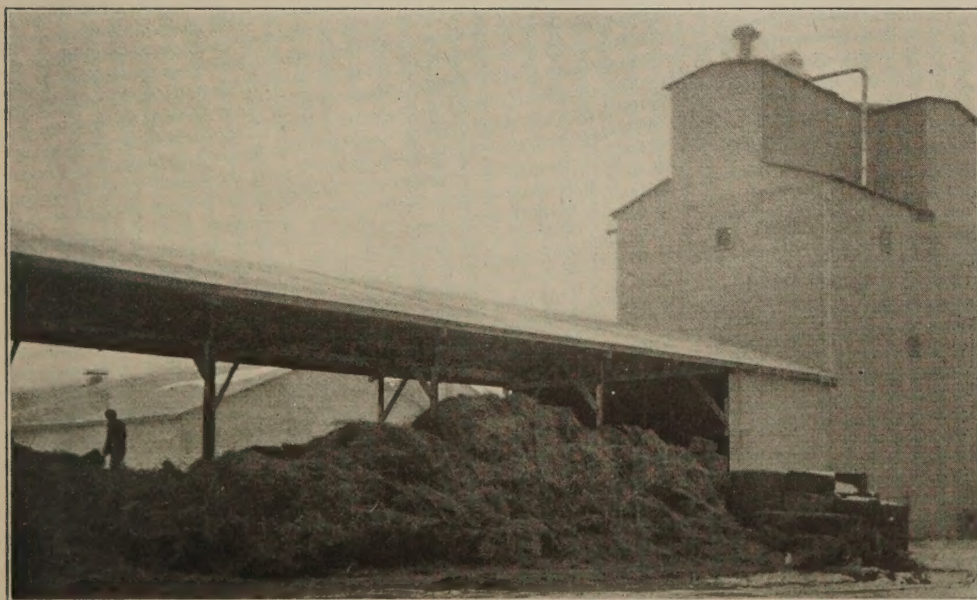
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New Plant of Pecos Valley Alfalfa Mills at Toledo, O.

a pig must receive is least when the various minerals are plentifully supplied in the proportions most suitable to the requirements of the body. The requirements of vitamin D for optimum growth and bone formation is least when the calcium to phosphorus ratio varies between 1:1 and 2:1.

Use and Cost of Blackstrap

In promoting the utilization of blackstrap molasses to conserve feed the federal livestock feed agency says blackstrap molasses is a carbonaceous feed, very palatable and, where fed to live stock, can replace, in whole or in part, corn, oats, barley or wheat. Cane molasses is only mildly laxative. It is a good conditioner, and as much as 9 or 10 lbs. per day may be fed to horses with safety, except when at hard work in the summer, when not over 6 lbs. should be fed. In a steer fattening ration, molasses is as valuable as corn up to about 3 lbs. per day but it can be used with safety up to 6 lbs. daily. Dairy cows can be safely fed molasses up to 4 or 5 lbs. per day. Molasses is also used in a limited way for feeding other live stock.

Assurance has been given by trade agencies that there will be ample supplies of molasses available to take care of the needs of live stock feeders in the United States for approximately 60 to 90 days and that the price during that period will not advance.

The delivered price to feeders depends to a large extent upon location and handling charges. The current base price is 7½¢ per gallon f. o. b. Gulf ports (\$12.83 a ton), or 6¢ per gal. f. o. b. Pacific coast ports (\$10.26 a ton). To these costs must be added freight and handling charges, which may quite fairly in some cases bring the cost delivered in drums to close to \$30 a ton, but in many instances, particularly where empty oil or kerosene drums are supplied by the purchaser, be as low as \$20 a ton.

Feed Prices

The Cereal By-Products Co. on Mar. 25 quoted the following prices on feeds, meals, ingredients and supplements, per ton, in car-load lots:

Mill Feeds			
Packed	Ship ment	Chi- cago	Va. Cities
Standard bran .....100s	Quick	26.50	30.90
Standard bran .....100s	April	25.00	29.40
Pure bran .....100s	Quick	27.25	31.65
Pure bran .....100s	April	25.25	29.65
Standard midds .....100s	Mar.	27.50	31.90
Standard midds .....100s	April	26.50	30.90
Rye midds .....100s	Prompt	23.00	27.40
Flour midds .....100s	Immed.	29.75	34.15
Red dog .....100s	Immed.	30.25	34.65
Concentrates			
40% O. P. linseed meal.100s	Immed.	40.10	....
34% O. P. linseed meal.100s	Immed.	34.50	....
30% Oil meal .....100s	Immed.	29.50	....
44% Soy bean oil meal.100s	Immed.	34.70	38.20
41% Cottonseed meal .100s	Immed.	36.00	37.65
43% Cottonseed meal .100s	Immed.	38.00	39.65
41% Peanut meal .....100s	Immed.	36.00	....
Alfalfa Meal			
Pevet—(Pecos 20% leaf)...	*Immed.	33.50	38.30
Velvet—(Pecos 17%)	*Immed.	31.50	36.30
Pecos Special (fine).....	*Immed.	29.00	28.40
No. 1 medium alfalfa meal	*Immed.	26.20	27.40
No. 2 medium alfalfa meal	*Immed.	25.20	26.40
Cereal Products			
Table grade oat products..	*Immed.	74.00	78.40
Feeding rolled oats.....100s	*Immed.	59.80	64.20
Rolled hulled barley.....100s	Immed.	....	....
Fine ground f'd'g oatmeal	Immed.	39.00	43.40
Reground oat feed.....100s	Immed.	11.50	16.90
Unground oat hulls,sacked	Immed.	13.00	18.40
White hominy feed.....100s	Immed.	27.50	31.50
Miscellaneous			
Malt sprouts standard....	*Mar.	22.00	26.40
Dried brewers grains.....	April	25.50	29.00
28% corn dist. grain.100s	Prompt	21.00	25.40
Chick cracked corn.....100s	Immed.	....	....
Cracked wheat .....100s	Immed.	....	....
Buckwheat .....bulk	†Prompt	1.30	....
Dried buttermilk .....100s	†Prompt	....	....
Dried skimmilk .....100s	†Prompt	4.60	....
Blackstrap molasses .....Spot 7½¢ f.o.b.	New Orleans.	....	....

*March. †Per cwt.

The Agricultural Situation

[Continued from page 219.]

the war to increase production 25% without any increase in acreage." And according to Dr. J. D. Black, "in round numbers 10 persons in 1925 were turning out the same agricultural product as 14 in 1910."

The experience of the farm board demonstrated to farm leaders the impossibility of controlling prices without controlling production. To raise prices it was necessary to reduce production. The device finally adopted to do this is incorporated in the A. A. A. In essence, under the A. A. A., the procedure is as follows:

Written contracts are made between the government and individual farmers; the contracting farmer agrees to reduce the acreage planted, to the crop considered, below the acreage planted in the years taken as a base period, by a certain percentage, specified by the Secretary of Agriculture within certain limits (in the case of live stock, reduction in number raised). The government, on its part, agrees to pay to the contracting farmer a money payment for such reduction. The money obtained for such purpose is through a process tax; that is, a government tax is imposed upon processors of agricultural products such as flour millers, pork packers and cotton mills.

The procedure developed for the making of hundreds of thousands of individual farm contracts is unique and apparently proved fairly successful. The government, largely through its extension service and county agents, called meetings in each county, of farmers interested in the reduction project. A permanent organization was formed of the farmers themselves, who elected their own committees and officers to handle and pass upon each contract. The government, through the Bureau of Crop and Live Stock Estimates, determined the acreage (or numbers of live stock) allotted to each county. The claims of the individual farmers had to be consistent with the records of the Bureau of Crop and Live Stock Estimates. There was some friction in this procedure, and some padding of claims, but on the whole the procedure seems to have worked well.

In a certain sense the farmers signed contracts to obtain advantages over those who refrained from signing contracts, getting something for nothing, rather than rights. Wallaces' Farmer, in appealing to farmers to "sign-up," referred to such contracts as bargains. In its issue of February 2 it says editorially: "This is the best bargain the corn belt farmer has ever had offered him in the history of the United States. It seems likely to be a better bargain than he will be offered again for some time."

In one meeting of farmers, a spokesman said that any farmer who does not get all he can out of the government is a — fool. I am reminded of a remark made by a former assistant secretary of agriculture in a meeting during the war, to discuss a guaranteed minimum price for wheat. He said, "Down in my state (Texas) when farmers talk about a minimum price, it is the maximum price they hope to get."

Aspiration among farmers to improve their well being is laudable and worthy of encouragement. But to my way of thinking there has been much humbug among those farm leaders who have tried through political efforts to raise prices to a certain artificial parity by the process of creating a scarcity.

Aggregate Crop Production in the United States in 1934 was the smallest since 1901; in production per capita population the smallest on record. This shortage was due mostly to drouth but partly to the government crop reduction program. Secretary Wallace, in his "New Frontiers" says: "What the A. A. A. had planned to do over two or three years, the drouth did—except for cotton and tobacco—in one." As a result of shortage of production, which the secretary says was planned the United States has been importing wheat from Canada, rye from Poland, oats from Argentina, corn from several countries including far away Manchuria. Recently Chicago received a solid train load of cattle from northern Alberta. Wheat

imports pay a duty of 42 cents a bushel, corn 25 cents, oats 16 cents, rye 15 cents and cattle \$3.00 a 100 pounds.

These importations are placing the administration in a predicament. In the grain trade frequent reference is made to importations as forming a ceiling to the market, tending to check an advance in prices, notwithstanding total importations to date have been relatively small in proportion to our total shortage. But with foreign prices as they are, agricultural commodities, which we normally produce in surplus, are being brought into the country, over the tariff wall in increasing volume; and this, before the so-called parity prices are reached. These importations could be checked by further raising of the tariff wall, but this would be inconsistent with the general tariff policy of the present administration.

The purpose of the A. A. A. policy of crop reduction is to correct what its advocates claim is a maladjustment between agriculture and urban industry, but the objective, as pointed out previously, is a price relationship which was the most advantageous to agricultural prices, that had existed in our history previous to 1910. It ignores innumerable factors affecting price levels. The method to bring about this artificial parity is through scarcity.

Economists have long recognized the seeming paradox of economic wealth; namely, that wealth is increased by an increased supply of economic goods; and also that wealth is increased by greater scarcity of economic goods—wealth due to abundance and wealth due to scarcity. The crop reduction plan of A. A. A. is based upon the principle of scarcity. I believe the Secretary of Agriculture at heart regards with repugnance the principle of wealth through scarcity. In his book on agricultural prices, he says: "Big crops do mean good business, although they mean prosperity to the farming class in an indirect way. A small crop generally brings farmers more money than a large crop; but small crops over a period of two or three years cause business depression and this reacts on farmers. The problem of both business men and farmers is to devise some means of giving farmers as a class a financial interest in producing big crops rather than small crops." The A. A. A. program has been contrary to this philosophy.

High Cost of Living: Already there are murmurings of complaint of the high cost of living, due to scarcity. I expect to hear more complaint in the future. Crop production in 1934 was the smallest since 1901, or in proportion to our population, the smallest on record. There are three kinds of crops, namely food crops, feed crops, and industrial crops, as cotton and flax. It is significant that the shortage of supply is very much the most severe in the case of feed crops. There is a longer lag between production and ultimate consumption of feeds than of food crops. The fruits and vegetables which you eat today were produced largely during the current season; but the meat you eat was from feeds produced two, three or more years ago. There is no severe scarcity of wheat due largely to a surplus from preceding crops; and potatoes are so plentiful that Maine producers complain that there is little or no profit in shipping them. To adjust the live stock supply to the reduced feed supply farmers have had to sell off their surplus live stock, thus increasing the food supply for the time being. About one-half of farm income comes from the sale of live stock and live stock products. Live stock inventories have been reduced on account of feed shortage, which means a shortage of marketed live stock and live stock products for some time in the future. This is why I believe that we are just at the beginning of complaints of high cost of living.

Paraders before the office of the Sec'y of Agriculture at Washington recently carried placards with the inscription "Prices are High; Wages are Low. How are we to live, Wallace?"

Effect of Wheat Consumption on World Prices

[Continued from page 221.]

are therefore not bought for storage in homes or restaurants but are purchased as used.

Millers are the primary consumers of wheat just as human beings at meal times are the ultimate consumers. The middle men between these two, the wholesalers, retailers, and bakers, do not normally buy or take delivery of flour in excess of current sales and do not make a policy of storing excess supplies. The reasons are much the same as with the housewife. Coming to the millers, we find that they regulate their grindings to their rate of sales. There is no practice of piling up stocks of flour and it is substantially true to say that flour is milled only at the rate at which it can be sold.

Traveling back from the miller to the wheat producer we find that the miller plans to take delivery of wheat according to his rate of milling. Some wheat storage capacity exists in connection with all mills but it is limited. Millers, of course, may acquire a claim to wheat well in advance by operations in the futures market or by purchases of cash wheat in store in other positions and perhaps in distant countries, but this wheat is not moved to the mills except as the mills grind and as the consumer consumes.

The producer is in an entirely different position because he is subject to the seasons. Most of the wheat is grown in the more temperate regions of the Northern Hemisphere and over 90 per cent of the world's supply is harvested between May and September. A great storage problem for wheat is thus inevitable, and how that storage problem is handled under conditions in which any holder of wheat can at any moment sell his holdings for spot cash and yet in the end the wheat moves to the mills as needed and is available to all mills in the world prepared to pay the market price, so that a shortage or an undue congestion of supply is a very rare occurrence, is the great achievement of the marketing system for wheat which has been built up through the ages.

Under these conditions any change in the rate of demand by ultimate consumers very directly and almost immediately reflects through to the primary markets for wheat. If the housewife does not buy, the baker and grocer do not buy, then the miller does not buy and the miller is the primary consumer of cash wheat.

Because of the immense quantities involved, a very slight percentage change in consumption makes an important change in the volume moving in trade channels. On the basis of the figures we are assuming, a decline of 10 per cent in demand would enable the world, including Canada, to get along if Canada ceased to grow a single bushel of wheat, and a 10 per cent reduction in demand is not impracticable. A decline of 5 per cent would be much easier to bring about and yet it would represent an aggregate cut of 225 million bushels. Even a 1 per cent reduction would be 45 million bushels, which is quite big enough to be a factor in international trade.

Engaged in international trade in wheat and flour are 16 net exporting countries, which are more or less regular surplus producers, and 143 net importing, or deficiency countries. The surplus of the net exporters, thus moving, represents roughly one-sixth of the world's production. The adjustments for variations in consumption must be made out of this one-sixth. A 5 per cent change in world demand either way will make a very much bigger change, theoretically something like 30 per cent, in the market for the surpluses. It is thus easy to see that even slight variations in demand become important influences in the chief market places where they must have effects upon prices.

While consumer demand is easily susceptible to fluctuation, with momentous results to trade, it is practically certain that in their actions consumers are not affected at all, or

only very slightly, by many of the facts and considerations that loom large in the minds of market operators. The great majority of consumers are not students of the market page and have no knowledge of what is called the statistical position of wheat. Only a very small percentage may be aware today that a world excess of wheat is calculated to exist or, if aware, very few indeed try to bargain with the grocer or the baker for a lower price on that ground. If it were suddenly announced that the statisticians figured the excess had been absorbed all consumers would not in consequence be ready to pay higher prices for the same amount of flour or bread. Higher prices might be demanded but the result would be just as under any other conditions, that some marginal consumers would drop off the list or some marginal uses be contracted.

Some of the expedients adopted to try to raise prices are consequently ineffective. Experiments in withholding supplies from current marketing under government authority or with government finance, or by international agreement, have not worked out as expected and theoretically cannot succeed. To offer less for sale may temporarily bring about a higher price by limiting the supply to the needs of those classes of consumers who can pay more.

The withholding of these supplies, however, must weaken the position for the future, because when these reserve stocks are marketed there will be more wheat on offer than would have been the case otherwise. Moreover, a reserve of demand does not necessarily accumulate and gather force. Physical wheat can be stored and grown in bulk, but a hunger for wheat not fully satisfied does not receive a new increment every day and proportionately swell in volume. A person with insufficient food of any kind for six months will not, under changed conditions, eat that much more during the next six months to make up. After one or two big meals he will be back on his normal ration again.

These considerations have a particular application to certain special kinds of wheat. If the principal millers of the world have been accustomed to use 40 per cent of strong wheat in their blends and because of price or the holding back of supplies they for a period come to using only 10 per cent of such wheats, they will not in any equal ensuing period use 70 per cent of hard wheat to make up the loss but will return only to their standard of 40 per cent. A demand lost by arbitrarily withholding a certain quantity of wheat or by arbitrarily setting a price tends to be a demand lost forever.

The basic fact of what consumers will and will not pay must be faced as a fact and dealt with on the only lines that can be practically effective. There are only two ways of ensuring higher price levels, one is by producing relatively less in the future, and the other, by enlarging the numbers of consumers with a taste for wheat and developing new uses for wheat. No other methods can prevail. If the plan adopted is that of relative reduction in supplies, then production must be actually cut down and kept down, for no such expedient as temporarily holding supplies off the market or regulating shipments can succeed. At best only temporary effects with inevitable reactions will follow such a course. It would almost seem that a vague idea is entertained by some that if the market price is coaxed or forced up by temporarily restricting sales until it may reach a desired level, then it will somehow stick there or can be hung on a peg and the balance of saleable stocks can then be unloaded upon it. This is not in accordance either with experience or with theory.

Expansion of demand will be equally as effective as a decrease of supplies and will be so much more in the interests of the world that it is unquestionably the only right plan. Wheat is the best of all single foodstuffs. Its taste when properly prepared is acceptable to almost all palates. It can be grown in every continent, it keeps well and can be moved cheaply. Plenty of scope exists for enlarging wheat consumption. The population of the world is increasing

over 20 million persons per year. Even at the present low world average this should mean a new demand for 10 million barrels of flour per year. And the present average is low. It is much lower than it should reasonably be even in North America and Europe. The average everywhere has been shrinking because of the artificial price spreads interposed between producer and consumer. Given a fair field and good salesmanship, wheat on its merits can win much wider markets.

This is in the interests of all classes and of world prosperity. More farmers in the world can grow wheat than can grow any other food-stuff that could serve the purpose of this staple even in an inferior way. Why should not farmers have an expanding market for wheat? They must meet the price consumers are willing to pay, but a growing market will tend to give strength to this price or at least make for stability.

If from the consumer price undue deductions are not made by restrictive national measures, the farmer will be able to judge for himself how much wheat he can afford to grow. Concerted effort to influence price, even under government direction or encouragement, by cutting acreage, would be uncertain of success and would operate fairly only, if it could be made universal.

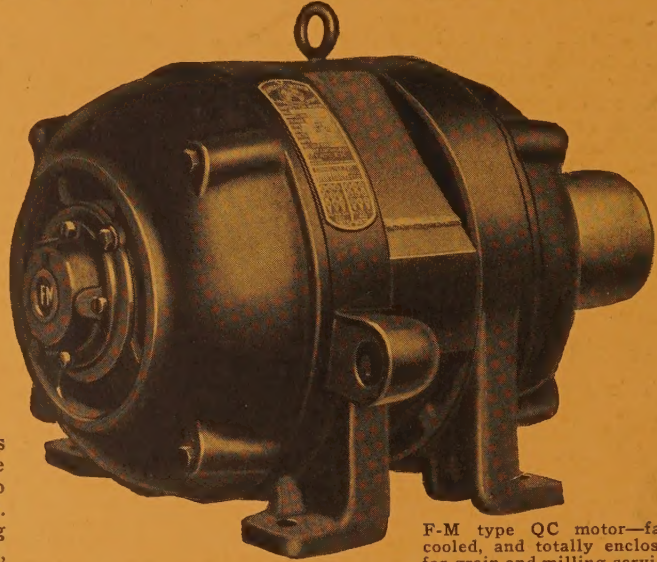
The effect that could be created by any one country would be disproportionate to the sacrifice. Even if all the surplus countries cut acreage by, say, 15 per cent, this would reduce the world supply by only 5 per cent and world price would not be much more affected. If 100 bushels of wheat could now be sold for \$100 it would be a losing transaction to cut down the supply to 85 bushels to be sold at \$1.05, or for \$89.25, and even if the price went to \$1.15 the amount realized would be only \$97.75 instead of the original \$100. There might be a small unit saving in cost in growing the reduced quantity, but even that could hardly make the transaction profitable to farmers if the price went only to \$1.05 per bushel, which is all that could be counted upon since the records of years shows that world price tends to vary in approximately direct ratio to world quantities with allowance for increase in world population.

If the idea of manipulation is recognized as illusory and impracticable, and if conditions are brought about in which there are no artificial and unnecessary deductions from the price consumers will pay, then the best judge of production is the individual farmer and it is the marginal farmer everywhere who should first drop out. There can be no surer way of effecting proper adjustment and more to the general economic advantage.

Looking beyond the immediate position of the farmer, wheat plays a big part in the economic world. All but a small fraction of its enormous volume calls for transportation from the farm, some of it to the ends of the earth, making work at all stages. As much as 25,000,000 long tons of wheat and flour has moved in international trade in a year, the average journey being some thousands of miles and creating a ton mile traffic perhaps the greatest on the oceans and business for the ports of 159 different countries. As convenient, yet revenue-bearing ballast, it cheapens and facilitates international trade in all finished goods. There is every argument for giving wheat a fair chance and for expanding its use.

Cotton sales abroad have been cut down about 50% by AAA policies and all branches of the cotton trade on which 10,000,000 persons depend for a livelihood are getting worried. Normally 60% of the crop is exported. Several hundred thousand families, formerly engaged in growing cotton, are reported to have been deprived of their occupation by crop curtailment. With from 35 to 40% fewer acres to be planted, cared for and picked, labor needs are sharply reduced. Mounting relief rolls in the South tell the story.

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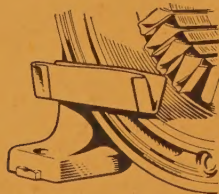
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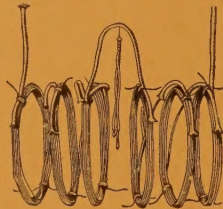
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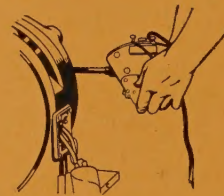
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